

AGREEMENT
Between the
NATIONAL PARK SERVICE
and the
AMERICAN TYPE CULTURE COLLECTION

This Agreement (the "Agreement"), effective as of the date of the last approving signature ("Effective Date"), renews an original Agreement dated December 18, 2003, and is made and entered into between the American Type Culture Collection, a not-for-profit organization located at 10801 University Boulevard, Manassas, Virginia 20110-2209 ("ATCC"), and the United States of America, United States Department of the Interior, National Park Service ("NPS").

I. BACKGROUND AND OBJECTIVES

NPS Specimens collected in NPS units pursuant to permits issued under 36 C.F.R. 2.5 are periodically deposited in culture collections. Culture collections are institutions that acquire, preserve, and distribute biological samples and related information, technology, and intellectual property to research scientists in academia and industry. Transfer of specimens to and by such third-party custodians requires NPS approval in accordance with the standardized NPS Research Permit terms and conditions.

The objective of this Agreement is to allow ATCC to accept and establish a collection of NPS Specimens designated as the National Park Service Special Collection (the "Collection") and distribute NPS Specimens to the scientific community under the NPS Scientific Research and Collecting Permit ("Research Permit") terms and conditions for the specimen.

II. DEFINITIONS

- A. "ATCC MTA" shall mean the then current Material Transfer Agreement, provided to customers by ATCC in the course of its business. A copy of this MTA is available at ATCC's web site (<http://www.atcc.org>).
- B. "**Bankruptcy Event**" shall mean either (a) commencement of a voluntary case or other proceeding seeking liquidation, reorganization or other relief with respect to ATCC or its debts under any bankruptcy, insolvency or other similar law now or hereinafter in effect, or seeking the appointment of a trustee, receiver, liquidator, custodian or other similar official of it or any substantial part of its property, or consenting to any such relief or to the appointment of or taking possession by any such official in an involuntary case or other proceeding commenced against it, or making a general assignment for the benefit of creditors, or failing generally to pay its debts as they become due, or taking any corporate action to authorize any of the foregoing; or (b) an involuntary case or other proceeding seeking liquidation, as they become due, or shall take any corporate action to authorize any of the foregoing; or (c) an involuntary case or other proceeding seeking liquidation, reorganization or other relief with respect to ATCC or its debts under any bankruptcy,

insolvency or other similar law now or hereinafter in effect or seeking the appointment of a trustee, receiver, liquidator, custodian or other similar official of it or any substantial part of its property, and such involuntary case or other proceeding shall remain undismissed and unstayed for a period of sixty (60) days; or (d) an order for relief being entered against ATCC under the U.S. federal bankruptcy laws as now or hereafter in effect.

- A. **"Confidential Information"** shall mean any information or material in tangible form that is marked as confidential or proprietary by the furnishing party at the time it is delivered to the receiving party, and information that is furnished orally if the furnishing party identifies such information as confidential or proprietary when it is disclosed and promptly confirms such designation in writing after such disclosure. Confidential Information does not include:
- 1) information that is publicly known or available from other sources who are not under a confidentiality obligation to the source of the information; or
 - 2) information that has been made available by its owners to others without a confidentiality obligation; or
 - 3) information that is already known by or available to the receiving Party without a confidentiality obligation; or
 - 4) information that relates to potential hazards or cautionary warnings associated with the production, handling, use or disposal of NPS Specimens; or
 - 5) information that is required by other applicable law or by this Agreement to be disclosed.
- B. **"Deaccession"** shall mean the withdrawal of NPS Specimens from the NPS Special Collection.
- C. **"Derivative"** shall mean material created from an NPS Specimen that is substantially modified to have new properties such as, by way of nonlimiting example, recombinant DNA clones made using a vector, or proteins extracted from a cell.
- D. **"Distribution"** shall mean the loan of NPS Specimens and Materials by ATCC to third parties as set forth in section IV(A)(3).
- E. **"NPS Catalog"** shall mean the National Park Service National Catalog of Museum Objects as described in Director's Order #24 NPS Museum Collections Management (4.1.4) available at https://www.nps.gov/subjects/policy/upload/DO_24_9-3-2008.pdf.
- F. **"NPS Permittees"** shall mean researchers that collect NPS Specimens in NPS units pursuant to permits issued under 36 C.F.R. 2.5.
- G. **"NPS Specimens"** and **"Material(s)"** shall equally mean cells, cell lines, viruses, related information, and other materials derived from living or dead organisms collected in NPS units including but not limited to those Materials specifically identified in Appendix 1. NPS Specimens shall include any replicates and derivatives of NPS Specimens.

- J. **"Replicate"** means any biological or chemical material that represents a substantially unmodified copy of a NPS Specimen such as, by way of nonlimiting example, material produced by growth of cells or microorganisms or amplification of NPS Specimens.
- K. **"Required NPS Procedures"** and **"Required ATCC Procedures"** shall equally mean those joint NPS Specimen management procedures that by their nature must be implemented as detailed in Appendix 4 of the Agreement.
- L. **"Transfer"** shall mean the loan of NPS Specimens and Materials to ATCC and from ATCC to researchers using a Material Transfer Agreement at the time of distribution.
- M. NPS and the ATCC shall be occasionally referred to as **"Parties"** in singular or plural usage as indicated by the context.

III. AUTHORITY

- A. NPS is authorized to enter this Agreement pursuant to the authority contained in the National Park Service Organic Act, 16 U.S.C. § 1, the National Parks Omnibus Management Act of 1998, 16 U.S.C. § 5935, and 16 U.S.C. § 18f, 18f-2 to 18f-3 (Management of Museum Properties).

IV. SCOPE OF WORK (ROLES AND RESPONSIBILITIES)

- A. Pursuant to this agreement NPS will:
 - 1. Authorize and encourage NPS Permittees to deposit NPS Specimens in the Collection at the ATCC using Deposit Forms prepared by ATCC and approved by NPS for the purpose of the Collection;
 - 2. Make available on the NPS permit website under Research Links at <https://www.nps.gov/subjects/science/general-conditions-for-scientific-research-and-collecting-permits.htm> the ATCC's NPS Special Collection Deposit Forms to NPS Permittees through a hyperlink to the NPS Special Collection's website address at <http://www.atcc.org/>;
 - 3. Authorize ATCC to distribute NPS Specimens that ATCC currently maintains and future deposits of NPS Specimens to requesting researchers through ATCC's MTA as amended by an approved NPS MTA addendum (attached as Appendix 2) as set forth in Sections V(C) and V(D), in accordance with ATCC standard operating procedures including fee arrangements. Said fee arrangements cover costs of authentication, accessioning, preservation, storage, distribution and other operating costs associated with transferring the specimens and do not include profit; and
 - 4. Implement all required NPS procedures included in the ATCC and NPS joint specimen management procedures set forth in Appendix 4.

B. Pursuant to this agreement ATCC will:

1. Create and curate a NPS Special Collection webpage at the ATCC website at www.atcc.org;
2. Create and make available on ATCC's website to NPS and NPS Permittees the NPS Special Collection Deposit Forms for inclusion of Material into the Collection;
3. Distribute NPS Specimens currently maintained by ATCC (listed in Appendix 1) and future deposits of NPS Specimens to requesting researchers under ATCC's MTA as amended by an approved NPS MTA addendum (attached as Appendix 2) as set forth in Sections V(C) and V(D);
4. Keep on file copies of the NPS MTA addendum executed by requesting scientists resulting from this Agreement, and make available such copies to NPS upon NPS request;
5. Comply with all applicable laws, rules and regulations pertaining to the development, testing, manufacture, storage, marketing, import or export, and disposal of the NPS Specimens. Without limiting the foregoing, ATCC acknowledges that the transfer of certain commodities and technical data is subject to certain United States laws and regulations controlling the export of such commodities and technical data, including all Export Administration Regulations of the United States Department of Commerce, and accordingly, ATCC will comply with and be solely responsible for any violation of all such laws and regulations;
6. In accordance with NPS rules, ATCC will maintain the procedure developed cooperatively with NPS to properly label, accession and catalog NPS Specimens and Materials (including Category 2 specimens, replicates and derivatives) as set forth in Section V(B) and Appendix 4;
7. Provide to NPS an annual report that shall include the information detailed in Appendix 4 under **Annual Report**;
8. Implement all Required ATCC Procedures included in the ATCC and NPS joint specimen management procedures set forth in Appendix 4; and
9. ATCC shall not destroy NPS Specimens deposited in Category 1 and Category 2 hereinafter defined. Notwithstanding the foregoing, scientifically irrelevant materials shall not be deposited in the NPS Special Collection and may be destroyed. (See Appendix 4, "Deaccession.")

V. OPERATIONAL PROCEDURES

- A. The specific temporal sequence of ATCC and NPS joint specimen management procedures shall be as described by the flowchart detailed in Appendix 3.
- B. At the discretion of ATCC's collection scientists, NPS Specimens may be included in the Collection in either of the following two (2) categories, each of which will be available for distribution by ATCC under the terms of the ATCC MTA as modified by the NPS MTA addendum accepted by requesting scientists in signed form:

Category 1: Storage and Standard Distribution: NPS Permittees shall produce one (1) year's supply of NPS Specimens, complete the appropriate Deposit Form and deposit the Material at ATCC for inclusion into the NPS Special Collection. Upon satisfactory quality controls, ATCC will store and distribute NPS Specimens deposited in Category 1 to ATCC's customers during the term of the Agreement.

Category 2: Accession: Category 2 shall include a) NPS Specimens deposited at ATCC prior to the Effective Date and which become a "repository" (i.e., Biological Resource Center, BRC) loan from NPS to ATCC from the Effective Date; and b) Materials under Category 1 or new Materials that will be made available for accession at such time as customer demand or significant scientific interest requires the replication of the materials by ATCC. ATCC's rights to store, distribute and replicate certain NPS Specimens deposited in Category 2 may survive the termination or expiration of the Agreement, upon mutual written consent of the Parties.

- C. ATCC shall not accept into the NPS Special Collection any NPS Specimens or Materials that are not previously accessioned and cataloged into the NPS Catalog.
- D. Except as otherwise agreed to in writing by NPS and ATCC, all NPS Specimens deposited with ATCC under this Agreement shall be made available for distribution by ATCC through ATCC's catalogue.
- E. NPS Specimens shall be distributed pursuant to Section IV(B)(3) only to ATCC qualified customer institutions or organizations having an approved account with ATCC upon prior execution of the NPS MTA addendum to the ATCC MTA.
- F. The Parties agree that the NPS Specimens will not be used in humans.

VI. KEY OFFICIALS AND CONTACTS

For purposes of mailings of notices or other communications, the addresses of the Parties are given below. A Party may change its address by giving written notice to the other Party.

A. For NPS:

1. Key Official for Scientific matters:
John Dennis
Deputy Chief Scientist
National Park Service
1849 C Street, NW (2300)
Washington, DC 20240
Tel: 202-513-7174
Fax: 202-371-2131
E-mail: John_Dennis@nps.gov
2. Key Official for Administrative and Collections Management matters:
Ann Hitchcock
Curator and Senior Advisor for Scientific Collections
National Park Service
1849 C Street, NW (2301)
Washington, DC 20240
Tel: 202-354-2271
Fax: 202-371-2422
E-mail: Ann_Hitchcock@nps.gov

B. For ATCC:

1. Key Official for Legal and Administrative matters:
Director, Licensing and Intellectual Property
ATCC
10801 University Boulevard
Manassas, VA 20110-2209
Fax: (+1) 703-334-2932
E-mail: licensing@atcc.org
2. Key Official for Collections Management matters:
Liz Kerrigan
Director, Products and Services
BioCollections and Standards
10801 University Boulevard
Manassas, VA 20110-2209
Tel : (+1) 703-365-2813
Fax: (+1) 703-365-2730
E-mail: lkerrigan@atcc.org

VII. CONFIDENTIALITY

- A. **"Confidential Information"** shall mean information concerning the nature and specific location (including exact collection site) of NPS specimens which are endangered, threatened, rare, or commercially viable.
- B. Protection of Confidential Information. Except as required under court order or the Freedom of Information Act (5 U.S.C. 552), ATCC must withhold Confidential Information from any form of release to non-NPS entities. Confidential Information shall not be disclosed, copied, reproduced or otherwise made available to any non-NPS person or entity without the consent of NPS.

VIII. INTELLECTUAL PROPERTY

- A. Ownership: NPS Specimens and Materials are the property of the United States Government.
- B. Enforcement of Rights: Any future action or lawsuit to enforce intellectual property rights involving NPS Specimens distributed by ATCC pursuant to Articles IV and V above, shall be initiated solely at the discretion of NPS. ATCC agrees to advise NPS of any events that cause ATCC to suspect that the transfer of an NPS Specimen to a third party is or may be violating ATCC's MTA or the NPS MTA addendum.
- C. License: Any transfer of NPS Specimens from NPS or NPS Permittees to ATCC shall constitute a nonexclusive worldwide royalty-free license to use the NPS Specimens in accordance with Articles IV and V above. ATCC agrees that the transfer of the NPS Specimens does not imply in any way a grant of any rights under any patents claiming the NPS Specimens or any right to use the NPS Specimens for commercial purposes or any other rights to the NPS Specimens except as stated herein.
- D. Future Benefits-Sharing Arrangements: On a case-by-case basis, and subject to any applicable federal procurement requirements, NPS may enter into separate arrangements allowing ATCC to provide services related to developing benefits-sharing arrangements between NPS and third parties with NPS "Material" from ATCC.
- E. Nothing in this Agreement shall be construed to affect ATCC's rights, title and interests in trademarks registered or owned by the ATCC and any and all ATCC catalog numbers or ATCC specific designations of biological Materials sold by the ATCC.
- F. The Parties agree to cite in publications referencing NPS specimens the following terms: "National Park Service," park name, specimen name, NPS catalog number, and ATCC number.

IX. WARRANTY, LIABILITY AND INDEMNIFICATION

- A. Each party accepts full responsibility for any property damage, injury, or death caused by the acts or omissions of their respective employees, acting within the scope of their employment, or their contractors' scope of work, to the fullest extent of the law. All claims shall be processed pursuant to applicable governing law.
- B. No indemnification for any loss, claim, damage, or liability is intended or provided by any party under this Agreement. The NPS shall be liable for the acts or omissions of its employees, acting within the course and scope of their employment, to the extent provided under the Federal Tort Claims Act, 28 U.S.C. §§ 1346, 2671-80. To the extent permitted by applicable law, ATCC shall be liable for the negligent or wrongful acts or omissions of its employees, acting within the course and scope of their employment.
- C. Any Materials transferred from one party to the other under this Agreement shall be provided AS IS; furthermore, the Parties make no representations whatsoever as to the Materials. They are provided WITHOUT WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE OR ANY OTHER WARRANTY, EXPRESS OR IMPLIED. THE PARTIES MAKE NO REPRESENTATION OR WARRANTY THAT THE USE OF THE MATERIAL WILL NOT INFRINGE ANY PATENT OR OTHER PROPRIETARY RIGHT. ATCC warrants that all distribution of Materials by ATCC as contemplated by this Agreement shall be in substantial compliance with all applicable U.S. Federal regulations.
- D. ATCC shall provide proof of public and employee liability insurance from a responsible company or companies with a minimum limitation of One Million Dollars (\$1,000,000) for any one claim, and an aggregate limitation of Two Million Dollars (\$2,000,000) from any number of claims arising from one incident.
- E. Neither Party shall be held liable or responsible to the other Party nor be deemed to have defaulted under or breached this Agreement for failure or delay in fulfilling or performing any term of this Agreement when such failure or delay is caused by or results from causes beyond the reasonable control of the affected Party (hereinafter, a Force Majeure event), including but not limited to fire, floods, embargoes, war, acts of war (whether war be declared or not), insurrections, acts of terrorism, riots, civil commotions, strikes, lockouts or other labor disturbances, acts of God or acts, omissions or delays in acting by any governmental authority (including regulatory and advisory bodies) or the other Party. Upon the occurrence of any Force Majeure event, the affected Party shall give written notice of such event to the other Party and shall use reasonable efforts to overcome such Force Majeure event.

X. TERM OF AGREEMENT

- A. This Agreement shall be in force for a period of one (1) year from the date of the last approving signature. The Agreement may be renewed for an additional term upon written

consent of the parties.

XI. TERMINATION

- A. This Agreement will terminate when the one (1) year term has expired, unless renewed in writing by the parties.
- B. Either Party may terminate this Agreement without any legal process whatsoever by giving the other party sixty (60) days written notice of termination, effective at the end of the sixty (60) day period, i) for no cause or ii) upon occurrence of any of the events set forth below, except that in the case of (c) or (d) such termination shall occur automatically and without the necessity of notice to the other Party.
 - (a) If either party fails to observe any of the material terms and conditions of the Agreement, and after sixty (60) days from receipt of written notice fails to cure such default.
 - (b) In the case of NPS, if ATCC violates the laws, regulations or other legal authority in any jurisdiction relating to the development, use, storage, or distribution of the NPS Specimens in a way that NPS deems it reasonable judgment to constitute a public safety or health hazard.
 - (c) If ATCC becomes insolvent, makes an assignment for the benefit of creditors, or becomes subject to a Bankruptcy Event. ATCC must give NPS immediate notice (within five (5) days) of the filing of any petition in bankruptcy, filing any petition seeking relief of the same or different kind under any provision of the Bankruptcy Act, or making any assignment for the benefit of creditors. For purposes of the bankruptcy statutes, NPS considers this Agreement an executory contract exempt from inclusion in the assets of ATCC pursuant to 11 U.S.C. 365.
 - (d) In case of the dissolution or cessation of operations by ATCC.
- C. Notwithstanding the foregoing, the NPS may terminate this Agreement for the convenience of the Government, at any time, when it is determined to be in the best interest of the public to do so. ATCC shall be notified in writing within five (5) working days following the termination;
- D. Surviving any termination or expiration are:
 - a) Any cause of action or claim of ATCC or NPS, accrued or to accrue, because of any breach or default by the other Party; and
 - b) Any provisions in this Agreement that by their nature are intended to survive. This shall specifically include Articles VII, VIII, IX, and Sections XI(D) and XII(B),(C).

- E. Except under Section XI(C), upon termination or expiration of this Agreement, NPS shall have the option of either:
- a. In the best interest of the scientific community, granting ATCC the rights to store, replicate and distribute certain NPS Specimens under ATCC's General Collection; or
 - b. permitting ATCC to continue, for a period of one (1) year following the date of termination, to distribute NPS Specimens that are in stock and to complete orders for NPS Specimens that are outstanding to the end of such one-year period, subject to all applicable provisions in the Agreement. At the conclusion of such one (1) year period, ATCC agrees to cease immediately the distribution of all NPS Specimens in the NPS Special Collection.

XII. REQUIRED AND STANDARD CLAUSES

- A. Non-Discrimination: The parties shall not discriminate in the selection of employees or participants for any employment or other activities undertaken pursuant to this Agreement on the grounds of race, creed, color, sex, age disability, or national origin, and shall observe all of the provisions of Title VI of the Civil Rights Act of 1964 (42 U.S.C. § 2000(d) *et seq*).
- B. Anti-Deficiency Act: Pursuant to the Anti-Deficiency Act, 31 U.S.C. § 1341(a)(1), nothing contained in this Agreement shall be construed as binding the United States to expend any sum in excess of appropriations made by Congress for the purposes of this Agreement, or as involving the United States in any contract or other obligation for the further expenditure of money in excess of such appropriations.
- C. Compliance with Applicable Law: The parties shall comply with all applicable laws and regulations. This Agreement is subject to all laws, regulations and rules governing NPS property, whether now in force or hereafter enacted or promulgated. Nothing in this Agreement shall be construed as in any way impairing the general powers of the NPS for supervision, regulation, and control of its property under such applicable laws, regulations, and rules.
- D. Advertising and Endorsements: ATCC may use the terms "NPS," "National Park Service," and the NPS arrowhead logo to identify NPS Specimens and the NPS Special Collection on ATCC's website, brochures and associated documentation, such as packing receipts, product sheets, specimen labels and invoices. ATCC shall not otherwise publicize or circulate promotional material (such as advertisements, sales brochures, or press releases) which states or implies NPS endorsement of a product, service, or position which ATCC represents, unless approved in advance by NPS. No release of information relating to this Agreement may state or imply that the NPS approves of the work product of ATCC to be superior to other products or services.

XIII. ASSIGNMENT

- A. No transfer or assignment of this Agreement, or any part thereof or interest therein, directly or indirectly, voluntarily or involuntarily, shall be made unless such transfer or assignment is first approved in writing by all the parties.

XIV. ADDITIONAL TERMS

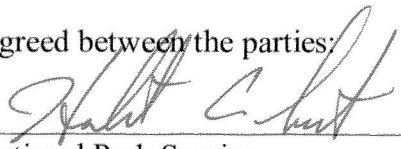
- A. The Agreement may be modified by written consent of all of the parties to cover the need for any alterations that may arise subsequent to the Effective Date of this Agreement.
- B. If any term or provision of this Agreement is held to be invalid or illegal, such term or provision shall not affect the validity or enforceability of the remaining terms and provisions.
- C. No term or provision of this Agreement shall be waived and no breach excused unless such waiver or consent shall be in writing and signed by the Party claimed to have waived or consented. No waiver of a breach shall be deemed to be a waiver of a different or subsequent breach. Failure by either Party to enforce, or delay in exercising, or partial exercise of any covenants or rights or remedies under this Agreement shall not be deemed or construed as a waiver of such rights, nor shall waiver by either Party in one or more instances be construed as constituting a continuing waiver or as a waiver in other or subsequent instances.
- D. In the event that further lawful performance of this Agreement or any part hereof by either Party shall be rendered impossible by or as a consequence of any law, regulation, order, rule, direction, priority, seizure, allocation, requisition, or any other official action by any department, bureau, board, administration, or other instrumentality or agency of any government or political subdivision thereof having jurisdiction over such Party, such Party shall not be considered in default hereunder by reason of any failure to perform occasioned thereby.
- E. Except as expressly stated herein, neither Party has the right or authority to assume or create any obligation, accept legal process, make commitments, incur any charges or otherwise bind or act on behalf of the other or limit the other in any manner whatsoever. Neither this Agreement nor any act hereunder shall be construed as constituting the foundation of a partnership, association, agency, joint venture or any other entity.
- F. The NPS and ATCC acknowledge that failure to perform the obligations and agreements set out herein and/or failure amicably and quickly to resolve disputes may result in irreparable injury to either Party. Accordingly, the Parties agree to use their best efforts to settle all disputes between them, and if and when that fails, the Parties agree to arbitrate any dispute in accordance with the rules of the American Arbitration Association as an alternative to litigation which both Parties pledge their best efforts to avoid, with any arbitration proceeding being nonbinding unless otherwise agreed to in advance by the

Parties. The Parties acknowledge and agree that arbitration is frequently expensive and time consuming, and thus, the Parties agree that in advance of any arbitration hereunder each shall use its mutual best efforts to negotiate a comprehensive set of procedures designed to ensure that such arbitration is conducted expeditiously and at the lowest possible cost.

- G. Appendices. This Agreement includes Appendices 1 through 6, which are hereby incorporated by reference.
- H. This Agreement constitutes and contains the entire Agreement of the Parties respecting its subject matter and supersedes any and all prior negotiations, correspondence, understandings and agreements, whether written or oral, between the Parties respecting its subject matter.

XV. AUTHORIZING SIGNATURES

Agreed between the parties:



National Park Service

Herbert C. Frost Ph.D.


Name

Associate Director, Natural Resource
Stewardship and Science

Title

3 Feb 2012

Date



American Type Culture Collection

Matthew B. Klusas

Name

Director, Corporate Development

Title

2/2/2012 MBK

Date

Concurred:



National Park Service

Ronald C. Wilson

Name

Chief Curator and Manager, Park
Museum Management Program

3 Feb 2012

Date

APPENDIX 1

LIST OF NPS SPECIMENS

APPENDIX 1 CONSTITUTES THE CATALOG OF THE NPS SPECIAL COLLECTION

ATCC [®] No. [™]	Item Description	Collection	National Park	NPS Cat. #	Date of Deposit	Status (12/08)
25079	<i>Geodermatophilus obscurus</i>	Bacteria	Zion Nat'l Park		10/17/68	BR
25104	<i>Thermus aquaticus</i>	Bacteria	Yellowstone Nat'l Park		12/30/68	AC
27009	<i>Alicyclobacillus acidocaldarius</i> <i>subsp. acidocaldarius</i>	Bacteria	Yellowstone Nat'l Park		3/12/71	AC
27180	<i>Synechococcus sp.</i>	Bacteria	Yellowstone Nat'l Park		10/08/71	AC
27502	<i>Thermomicrobium roseum</i>	Bacteria	Yellowstone Nat'l Park		8/04/72	BR
27737	<i>Thermus sp.</i>	Bacteria	Yellowstone Nat'l Park		8/27/73	AC
29183	<i>Methanobacterium thermoautotrophicus</i>	Bacteria	Yellowstone Nat'l Park		9/10/75	AC
29362	<i>Chloroflexus aurantiacus</i>	Bacteria	Yellowstone Nat'l Park		7/29/76	BR
29363	<i>Chloroflexus aurantiacus</i>	Bacteria	Yellowstone Nat'l Park		7/29/76	AC
29364	<i>Chloroflexus aurantiacus</i>	Bacteria	Yellowstone Nat'l Park		7/29/76	AC
30350	<i>Tetrahymena hyperangularis</i>	Protozoan	Rocky Mt Nat'l Park		9/22/75	AC
30351	<i>Tetrahymena hyperangularis</i>	Protozoan	Rocky Mt Nat'l Park		9/22/75	AC
31550	<i>Thermoanaerobacter ethanolicus</i>	Bacteria	Yellowstone Nat'l Park		8/13/79 PAT	BR
33223	<i>Thermoanaerobacter pseudethanolicus</i>	Bacteria	Yellowstone Nat'l Park		12/26/79	AC
33265	<i>Thermoanaerobacter acetoethylicus</i>	Bacteria	Yellowstone Nat'l Park		4/21/80	BR
33708	<i>Thermodesulfobacterium commune</i>	Bacteria	Yellowstone Nat'l Park		11/03/81	AC
33743	<i>Thermoanaerobacterium thermosulfurigenes</i>	Bacteria	Yellowstone Nat'l Park		11/30/81	BR
33909	<i>Sulfolobus acidocaldarius</i>	Bacteria	Yellowstone Nat'l Park		7/23/82	BR
33909D-5	Genomic DNA from <i>Sulfolobus acidocaldarius</i>	Bacteria/DNA	Yellowstone Nat'l Park		5/27/08	AC
33924	<i>Moorella thermautotrophica</i> (<i>Clostridium thermoautotrophicum</i>)	Bacteria	Yellowstone Nat'l Park		8/03/82	BR
35264	<i>Thermoleophilum album</i>	Bacteria	Yellowstone Nat'l Park		8/29/83	BR
35265	<i>Thermoleophilum minutum</i>	Bacteria	Yellowstone Nat'l Park		8/29/83	BR
35610	<i>Methanobacterium thermoautotrophicus</i>	Bacteria	Yellowstone Nat'l Park		1/28/83	AC
35887	<i>Rhodopila globiformis</i>	Bacteria	Yellowstone Nat'l Park		12/06/84 2/07/05 IC	IC Seed contamin- ated

APPENDIX 1**LIST OF NPS SPECIMENS****APPENDIX 1 CONSTITUTES THE CATALOG OF THE NPS SPECIAL COLLECTION**

ATCC® No. TM	Item Description	Collection	National Park	NPS Cat. #	Date of Deposit	Status (12/08)
43033	<i>Alicyclobacillus acidocaldarius</i>	Bacteria	Yellowstone Nat'l Park		6/10/85	BR

APPENDIX 1

LIST OF NPS SPECIMENS

APPENDIX 1 CONSTITUTES THE CATALOG OF THE NPS SPECIAL COLLECTION

ATCC® No.™	Item Description	Collection	National Park	NPS Cat. #	Date of Deposit	Status (12/08)
43034	<i>Alicyclobacillus acidocaldarius</i>	Bacteria	Yellowstone Nat'l Park		6/10/85	BR
43035	<i>Alicyclobacillus acidocaldarius</i>	Bacteria	Yellowstone Nat'l Park		6/10/85	BR
43061	<i>Thermochromatium tepidum</i>	Bacteria	Yellowstone Nat'l Park		7/05/85 8/03/06 IC	IC
43068	<i>Acidothermus cellulolyticus</i>	Bacteria	Yellowstone Nat'l Park		8/20/85	AC
43068D-5	Genomic DNA from <i>Acidothermus cellulolyticus</i>	Bacteria/DNA	Yellowstone Nat'l Park		7/12/07	AC
49341	<i>Bacillus</i> sp.	Bacteria	Yellowstone Nat'l Park		8/14/89	AC
49342	<i>Bacillus</i> sp.	Bacteria	Yellowstone Nat'l Park		8/14/89	BR
49914	<i>Thermoanaerobacterium xylanolyticum</i>	Bacteria	Yellowstone Nat'l Park		5/1/92 11/13/03 IC	IC non-viable No replacement
50399	<i>Adriamonas</i> sp. 2	Protozoan	Yellowstone Nat'l Park		9/24/92	AC
50400	<i>Cyrtolophosis acuta</i>	Protozoan	Yellowstone Nat'l Park		9/10/91	AC
50405	<i>Spongomonas minima</i>	Protozoan	Arches Nat'l Park	ARCH 3517	11/18/88	AC
51123	<i>Spiroplasma</i> sp.	Bacteria	Big Bend Nat'l Park		10/08/92	BR
51303	<i>Thermodesulfovibrio yellowstonii</i>	Bacteria	Yellowstone Nat'l Park		7/23/93	BR
51577	<i>Heliobacterium modesticaldum</i>	Bacteria	Yellowstone Nat'l Park		10/18/94	BR
53033	<i>Thermoanaerobacter thermohydrosulfuricus</i>	Bacteria	Yellowstone Nat'l Park		2/19/85	AC
53556	<i>Thermoanaerobacter brockii</i>	Bacteria	Yellowstone Nat'l Park		12/03/86 PAT	AC
55161	<i>Streptomyces albus</i> subsp. <i>albus</i>	Bacteria	Yosemite Nat'l Park		3/14/91 PAT	BR
55712	<i>Unidentified bacterium</i>	Bacteria	Yellowstone Nat'l Park		9/20/95 2/7/05 IC	IC Seed contaminated
55721	<i>Acidothermus cellulolyticus</i> (identified as a redeposit of 43068)	Bacteria	Yellowstone Nat'l Park		11/14/95 PAT	BR
76361	<i>Marasmius pulcherripes</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76374	<i>Marasmius androsaceus</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC

APPENDIX 1

LIST OF NPS SPECIMENS

APPENDIX 1 CONSTITUTES THE CATALOG OF THE NPS SPECIAL COLLECTION

ATCC® No.™	Item Description	Collection	National Park	NPS Cat. #	Date of Deposit	Status (12/08)
76377	<i>Marasmius androsaceus</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76379	<i>Marasmius rotula</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76385	<i>Marasmius decipiens</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76386	<i>Marasmius androsaceus</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76387	<i>Marasmius capillaris</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76388	<i>Marasmius scorodoni</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76389	<i>Marasmius fulvoferrugineus</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76390	<i>Marasmius rotula</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76391	<i>Marasmius olneii</i> var. <i>olneii</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76393	<i>Marasmius pallidocephalus</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76394	<i>Marasmius fulvoferrugineus</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76395	<i>Marasmius rotula</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76397	<i>Marasmius sullivantii</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76400	<i>Marasmius sullivantii</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76407	<i>Marasmius straminipes</i> var. <i>straminipes</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76409	<i>Marasmius falcatis</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC

APPENDIX 1

LIST OF NPS SPECIMENS

APPENDIX 1 CONSTITUTES THE CATALOG OF THE NPS SPECIAL COLLECTION

ATCC® No.™	Item Description	Collection	National Park	NPS Cat. #	Date of Deposit	Status (12/08)
76412	<i>Marasmius cohaerens</i> var. <i>lachnophyllus</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76424	<i>Marasmius straminipes</i> var. <i>straminipes</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76425	<i>Marasmius pyrrhocephalus</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76427	<i>Marasmius scorodoni</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76429	<i>Marasmius pulcherripes</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76431	<i>Marasmius pulcherripes</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76433	<i>Marasmius olneii</i> var. <i>olneii</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76434	<i>Marasmius olneii</i> var. <i>olneii</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76436	<i>Marasmius capillaris</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76437	<i>Marasmius scorodoni</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76440	<i>Marasmius strictipes</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76441	<i>Marasmius olneii</i> var. <i>olneii</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76442	<i>Marasmius capillaris</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76443	<i>Marasmius rotula</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76445	<i>Marasmius pyrrhocephalus</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76446	<i>Marasmius fulvoferrugineus</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC

APPENDIX 1

LIST OF NPS SPECIMENS

APPENDIX 1 CONSTITUTES THE CATALOG OF THE NPS SPECIAL COLLECTION

ATCC [®] No. [™]	Item Description	Collection	National Park	NPS Cat. #	Date of Deposit	Status (12/08)
76447	<i>Marasmius pulcherripes</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
76448	<i>Marasmius capillaris</i>	Mycology	Great Smoky Mts Nat'l Park		5/14/91	AC
200627	<i>Helicon fuscosporum</i>	Mycology	Yellowstone Nat'l Park		1/18/96	AC
201433	<i>Paraphaeosphaeria nolinae</i>	Mycology	Big Bend Nat'l Park		10/07/97	AC
205033	<i>Tetrahymena pigmentosa</i>	Protozoan	Rocky Mt Nat'l Park		10/20/93	AC Test tube
700319	<i>Anaerobranca horikoshii</i>	Bacteria	Yellowstone Nat'l Park		6/5/97	BR
700984	<i>Thermobrachium celere</i>	Bacteria	Yellowstone Nat'l Park		6/21/00	AC
700985	<i>Thermolithobacter ferrireducens</i>	Bacteria	Yellowstone Nat'l Park		6/21/00	AC
PRA-13	<i>Echinamoeba thermarum</i>	Protozoan	Yellowstone Nat'l Park		8/13/02	AC
BAA-426	<i>Geothermobacterium ferrireducens</i>	Bacteria	Yellowstone Nat'l Park		1/28/02	PP
BAA-798	<i>Thermobaculum terrenum</i>	Bacteria	Yellowstone Nat'l Park		6/6/03	BR
BAA-845	<i>Unidentified bacterium</i>	Bacteria	Yellowstone Nat'l Park		9/19/03	BR
BAA-943	<i>Geobacillus tepidamans</i>	Bacteria	Yellowstone Nat'l Park		3/24/04	BR
BAA-1105	<i>Acidicaldus organivorans</i>	Bacteria	Yellowstone Nat'l Park		11/19/04	BR
BAA-1283	<i>Exiguobacterium sp.</i> AT1b	Bacteria	Yellowstone Nat'l Park	YELL 126242	3/09/06	AC
BAA-1283D-5	Genomic DNA from <i>Exiguobacterium sp.</i> AT 1b	Bacteria/DNA	Yellowstone Nat'l Park		1/29/07	BR
BAA-1387	<i>Acidisphaera sp.</i> C197	Bacteria	Yellowstone Nat'l Park	YELL 166639	10/19/06	PP
BAA-1551	<i>Acidilobus sulfurireducens</i>	Bacteria	Yellowstone Nat'l Park	YELL 180353	9/13/07	PP
BAA-1552	<i>Caldisphaera draconis</i>	Bacteria	Yellowstone Nat'l Park	YELL 180354	9/13/07	PP
BAA-1607	<i>Thermofermentum shockii</i> , strain WB1	Bacteria	Yellowstone Nat'l Park		2/07/08	PP
BAA-1645	<i>Ferrithrix thermotolerans</i>	Bacteria	Yellowstone Nat'l Park	YELL 182758	4/24/08	PP

APPENDIX 1

LIST OF NPS SPECIMENS

APPENDIX 1 CONSTITUTES THE CATALOG OF THE NPS SPECIAL COLLECTION

Status Codes:

AC	Accessioned (available for distribution)
BR	Bill review (available for distribution)
PP	Pre-production (not on web, not available for distribution)
RD	Research and development
IC	No longer available

APPENDIX 2

The National Park Service Special Collection

MATERIAL TRANSFER AGREEMENT

Agreement Concerning Distribution and Use of Cultures Requiring NPS Authorization

The following additional provisions apply to the distribution and use of cultures requiring authorization of the U.S. National Park Service (NPS) before distribution.

INSTRUCTIONS: Principal Investigator must complete items 1, 2, and 3 and both the Principal Investigator and the authorized representative of Investigator's Institution must sign where indicated. Fax the completed MTA to ATCC, Attn: Sales at 703-365-2750, or to your local distributor. You may contact the ATCC Sales Department at 800-638-6597, 703-365-2700, or status@atcc.org if you have any questions regarding the status of your order, or contact your local distributor. Please use a separate form for each material to be transferred.

1. Principal Investigator's Name: _____
2. Investigator's Institution: _____
3. Address: _____
4. Description of Material &
ATCC and NPS Catalog Numbers: _____

The American Type Culture Collection ("ATCC") is providing the Investigator's Institution ("Purchaser") with biological materials that require authorization from the U.S. National Park Service ("NPS") prior to distribution (referred to collectively as "MATERIAL"). You specifically acknowledge and agree to the following terms and conditions:

TERMS

"REPLICATE" means any biological or chemical material that represents a substantially unmodified copy of the MATERIAL such as, but not limited to, material produced by growth of cells or microorganisms or amplification of MATERIAL. "DERIVATIVE" means material created from the MATERIAL that is substantially modified to have new properties such as, but not limited to, recombinant DNA clones made using a vector purchased from ATCC.

USE OF MATERIAL

By accepting MATERIAL, Purchaser agrees to comply with all applicable terms and conditions of the NPS Scientific Research and Collecting Permit (available at the address below or by going to the following website: <https://www.nps.gov/subjects/science/general-conditions-for-scientific-research-and-collecting-permits.htm>) that govern the distribution and use of research specimens collected from U.S. national park units. Specifically, Purchaser:

- (a) acknowledges and agrees that MATERIAL and REPLICATES are property of the United States Government.
- (b) understands and agrees that all MATERIAL, REPLICATES, or DERIVATIVES (including any bioactive molecules or genetic materials obtained from MATERIAL, REPLICATES, or DERIVATIVES) and research results derived from the use of MATERIAL, REPLICATES, or DERIVATIVES may be used for scientific or educational purposes only, and may not be used for commercial or other revenue-generating purposes without the prior written authorization of NPS.
- (c) understands and agrees that the destruction of MATERIAL or REPLICATES is not authorized without the prior written authorization of the NPS.
- (d) understands and agrees that the sale or other unauthorized transfer of MATERIAL, REPLICATES, or DERIVATIVES to third parties is prohibited.
- (e) agrees to provide to NPS a copy of any final reports, publications, and other findings resulting from use of MATERIAL, REPLICATES, or DERIVATIVES. In addition, Purchaser agrees to provide notice in writing to NPS not less than sixty (60) days before filing an application for a patent or other intellectual property claim resulting from use of MATERIAL, REPLICATES, or DERIVATIVES.
- (f) agrees to cite in any publication and patent application referencing MATERIAL, REPLICATES, or DERIVATIVES the following terms: "National Park Service" name of U.S. National Park unit where NPS Specimen was originally collected, specimen name, NPS catalog number, and ATCC[®] catalog number.
- (g) to the extent allowable by law, Purchaser hereby agrees to hold harmless and indemnify the U.S. Department of the Interior, National Park Service, and any unit thereof, the United States Government, and persons acting on their behalf, including ATCC, for any claim asserted by a third party related to Purchaser's possession, use, storage, or disposal of MATERIAL, REPLICATES, or DERIVATIVES.

APPENDIX 2

BY SIGNING BELOW, THE DULY AUTHORIZED REPRESENTATIVE OF THE INSTITUTION ACKNOWLEDGES THAT HE/SHE HAS READ AND UNDERSTANDS THE NATIONAL PARK SERVICE MATERIAL TRANSFER AGREEMENT AND AGREES TO ITS TERMS AND CONDITIONS ON BEHALF OF THE INSTITUTION AS EVIDENCED BY HIS/HER SIGNATURE BELOW, AND THE INVESTIGATOR HAS READ AND UNDERSTANDS THE TERMS AND CONDITIONS OF THIS AGREEMENT AS EVIDENCED BY HIS/HER SIGNATURE BELOW.

FOR INSTITUTION:

By: _____

Printed Name: _____

Title: _____

Date: _____

PRINCIPAL INVESTIGATOR:

By: _____

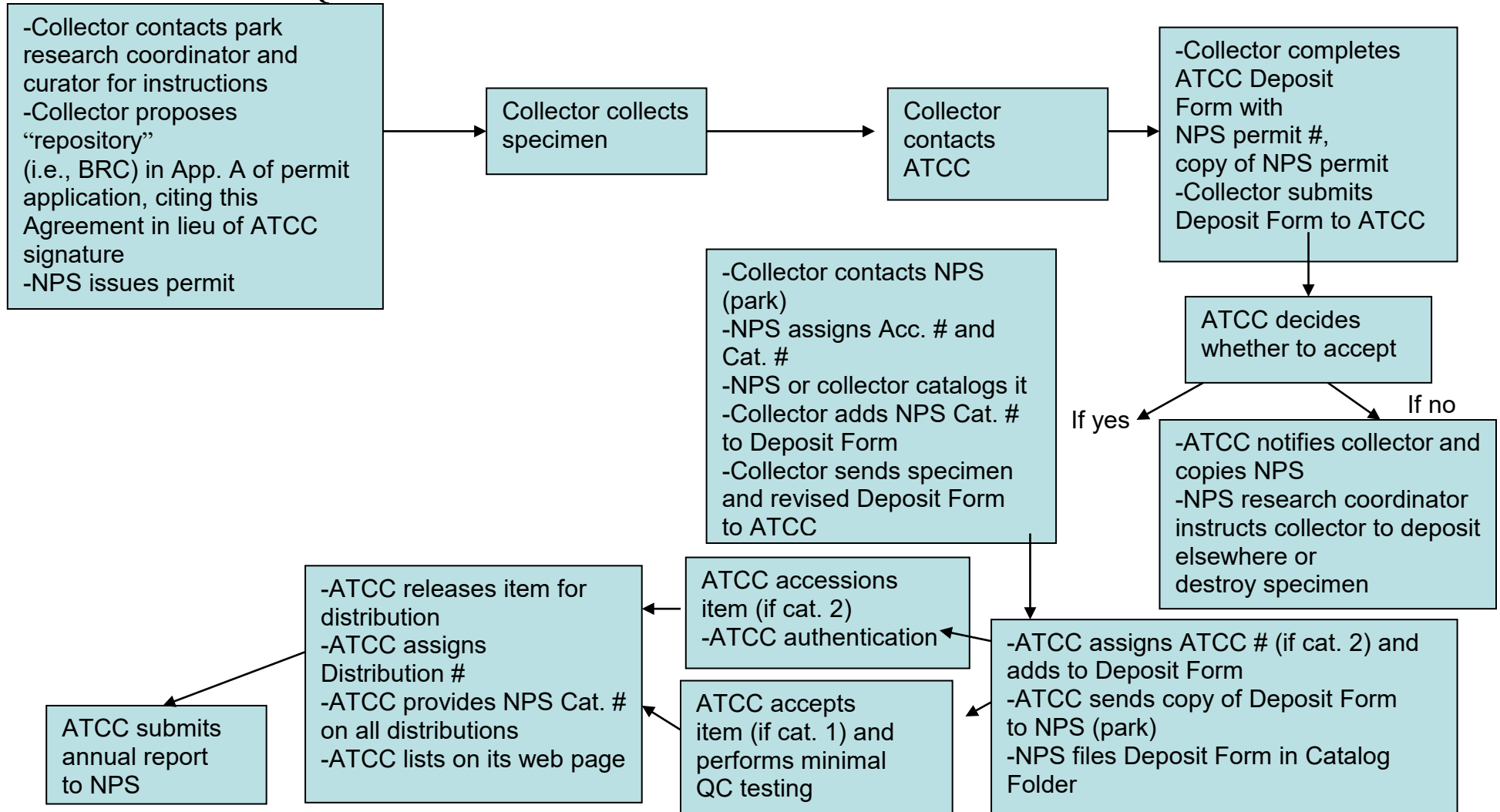
Printed Name: _____

Title: _____

Date: _____

APPENDIX 3

SEQUENCE OF ATCC AND NPS JOINT SPECIMEN MANAGEMENT PROCEDURES



Note: If an item is deaccessioned by ATCC, ATCC will notify NPS in the annual report. For more information on the difference between ATCC cat. 1 and 2, please see Agreement and Appendices

STANDARD PROCEDURE	Required NPS Procedure	Required ATCC Procedure
Permit	<ul style="list-style-type: none"> - Collector contacts park research coordinator and curator for instructions - Collector applies for permit, proposing ATCC as “repository” (i.e., Biological Resource Center [BRC]) in App. A of permit application, citing this Agreement in lieu of ATCC signature - NPS (park) issues permit 	<ul style="list-style-type: none"> - File e-mail giving collector’s name, park name, permit number
Decision on Acquisition into ATCC		<ul style="list-style-type: none"> - Collector submits proposed Deposit Form to ATCC, showing NPS permit number, and copy of NPS research permit - ATCC notifies collector in writing whether ATCC will accept specimen (copy to NPS)
Acquisition and Accessioning of Items in Category 1	<ul style="list-style-type: none"> - Collector provides NPS with information for accessioning specimens into NPS National Catalog (Automated National Catalog System-ANCS+). - Park notifies ATCC of confidential information that must be withheld from release to the public. - Park completes accession information and generates accession receiving report - Park completes Catalog function simultaneously 	<ul style="list-style-type: none"> - Collector completes Deposit Form, including NPS Catalog number and NPS permit number. - ATCC sends completed Deposit Form to NPS (park)
Acquisition and Accessioning of Items in Category 2	<ul style="list-style-type: none"> - Same procedures as above unless specimens were previously accessioned at ATCC in Category 1 	<ul style="list-style-type: none"> - Same procedures as above unless materials previously deposited in Category 1. - Perform full authentication on material, adjudicate ATCC Catalog number and accession

APPENDIX 4

COLLECTION MANAGEMENT PROCEDURES

STANDARD PROCEDURE	Required NPS Procedure	Required ATCC Procedure
		into ATCC Collection (NPS Special Collection).
Cataloging	- Collector or park catalogs specimen and assigns NPS catalog number (completed at same time as acquisition and accessioning).	- ATCC catalogs in NPS Special Collection in either Category 1 (NPS number only) or Category 2 (both ATCC and NPS numbers).
Delivery		- Collector ships accepted specimens to ATCC under regulatory compliance.
Catalog Derivatives (DNA, RNA, proteins)	- NPS accessions and catalogs derivative in NPS National Catalog - NPS sends catalog number to ATCC	- ATCC notifies NPS of derivative - Upon receipt of NPS catalog number, ATCC accessions and catalogs derivative into NPS Special Collection and may begin to distribute derivatives to requesting scientists as set forth in Section IV(B)(3).
Catalog Replicates	-NPS (park) updates item count on catalog record according to item counts reported on annual report.	- ATCC replicates materials to create or replenish inventory following ATCC's standard operation procedures. - ATCC increases item count for a single ATCC catalog number to account for replicates.
Labels	-Collector provides a temporary label with NPS catalog number and specimen identification. -NPS substitutes ATCC requirement for normal NPS requirements because of small size of specimen and container.	- ATCC will include NPS catalog number on label of i) newly accessioned materials and ii) previously accessioned materials only when replenishing inventory. - The NPS catalog information will be in the twelve (12)-character format: "PARK #####" where "PARK" is the acronym of the park and is part of the NPS catalog number.

APPENDIX 4**COLLECTION MANAGEMENT PROCEDURES**

STANDARD PROCEDURE	Required NPS Procedure	Required ATCC Procedure
Associated Records	<ul style="list-style-type: none">-NPS (park) asks collectors to provide originals or archival copies of field notes, maps, and other materials identified in park-specific permit conditions.-NPS (park) maintains and catalogs this material in its archival collections.	<ul style="list-style-type: none">-ATCC maintains files of records that it creates or receives pertaining to the specimens in its collections.-ATCC has original paper and digital image copies of these files.
Product sheets		<ul style="list-style-type: none">- ATCC will include ATCC catalogue number, NPS catalog number, “National Park Service,” park name, and NPS arrowhead on the product sheet.
NPS Loan to ATCC	<ul style="list-style-type: none">- NPS (park) completes outgoing loan to ATCC showing:<ul style="list-style-type: none">- loan purpose as “storage and collections management”.- termination date as the termination date of this agreement.- authorization for third party loans- authorization for destructive sampling.- ATCC signature is not required on loan as loan is governed by this Agreement.- Note: Park may maintain a single loan to ATCC that it amends as specimens are added/removed, or it may record a separate loan for each transmission to ATCC.	<ul style="list-style-type: none">- As set forth in Articles IV and V, and Appendix 3 of the Agreement.
ATCC loan (distribution) to Qualified Requesting Scientist	<ul style="list-style-type: none">-NPS relies on ATCC distribution records to track third party loans	<ul style="list-style-type: none">- ATCC uses NPS MTA to document transfers (loans) of NPS Specimens as set forth in Articles IV and V of the agreement.

STANDARD PROCEDURE	Required NPS Procedure	Required ATCC Procedure
Annual Physical Inventory	- For specimens at ATCC that appear on a park's annual inventory, the park will note on the inventory "On repository loan to ATCC"	- ATCC does random sample inventory of its total collection witnessed by two ATCC employees. - ATCC will randomly select and annually inventory at least 20 NPS specimens or 20 percent of the NPS specimens held, whichever sample includes fewer specimens. Inventories may be done quarterly (5 NPS Specimens per quarter) for a cumulative annual total. -ATCC reports its annual inventory findings to NPS as part of the Annual Report
Deaccession	- NPS (park) deaccessions specimens discarded and records deaccession on applicable catalog records	- Under this agreement, ATCC is authorized to dispose of Material in the following cases: lack of viability, redundancy, misidentification resulting in no scientific value, contamination, and as required by Appendices 5 and 6. - ATCC communicates disposal to NPS on Annual Report
Destructive testing	- NPS (park) deaccessions specimens destroyed and records deaccession on applicable catalog records	- Under this Agreement, Parks give ATCC blanket authorization to do destructive testing and include statement on loan form. See loan. - ATCC reports such destruction in the Annual Report. See Annual Report.
Loss	- NPS (park) records loss on catalog record	- ATCC reports loss to NPS within five (5) days of discovery.
Annual Report	-NPS (park) files a copy of this report in the outgoing loan file -NPS (park) records updated item counts for NPS	- ATCC releases Annual report per IV.B(7) for the period October 1 through September 30 to NPS during annual meeting. Report will be provided in electronic and hardcopy. Contents of Annual

STANDARD PROCEDURE	Required NPS Procedure	Required ATCC Procedure
	<p>specimens on the catalog records.</p> <ul style="list-style-type: none"> -NPS (park) records ATCC numbers on corresponding NPS catalog records - For third party loans (distributions using MTA), NPS (park) records recipient organization, contact name, address, telephone number, date of order (start date of loan), and number of items in “loans out” supplemental record for each cataloged specimen -NPS (park) records on applicable catalog records damage to specimens -NPS (park) records on applicable catalog records changes to identification or description of specimens -NPS (park) deaccessions specimens discarded or destroyed and records deaccession on applicable catalog records 	<p>Report are:</p> <ul style="list-style-type: none"> - An updated Appendix 1 detailing the deposit of new NPS Specimens, with their respective NPS and ATCC catalogue numbers and copies of deposit forms. - Current number of NPS Specimens in inventory at ATCC, listed by NPS catalog number, including ATCC number, status and status decode, item description, product line, quantity on hand, and comments. - A recapitulation of all distributions of NPS Specimens during previous NPS fiscal year, which extends from October 1 of previous calendar year to September 30 of the then current calendar year, indicating: <ul style="list-style-type: none"> • Requesting organization, contact name, address, telephone number • End user organization, contact name, address, telephone number • Date of order • NPS catalog number • Distribution number (alpha-numeric format “SO #####”) <p>Report also shows:</p> <ul style="list-style-type: none"> • Materials proposed by NPS Permittees but rejected by ATCC (not accessioned into Collection)

APPENDIX 4**COLLECTION MANAGEMENT PROCEDURES**

STANDARD PROCEDURE	Required NPS Procedure	Required ATCC Procedure
		<ul style="list-style-type: none">- An annual physical inventory report stating dates(s) inventory was completed and the findings.- If applicable, damaged specimens by catalog number.- If applicable, any changes to identification or description of specimens.- If applicable, specimens discarded for reasons identified under Deaccession- If applicable, specimens destroyed through testing.
Annual Meeting	- Selected representatives from NPS and ATCC meet once annually (before November 30 of calendar year) for presentation and discussion of the Annual Report	

APPENDIX 5

LIST OF QUALITY CONTROL CRITERIA REQUIRED FROM NPS PERMITTEES PRIOR TO DEPOSITING NPS SPECIMENS UNDER CATEGORY 1 OF THE NPS SPECIAL COLLECTION

Prior to the acceptance of materials by ATCC for deposit in Category 1 of the NPS Special Collection, the NPS Permittee shall be required to document that quality control (QC) tests have been performed that demonstrate the material meets the following minimum specifications. If the NPS Permittee cannot perform and/or demonstrate such testing, a representative material sample could be forwarded to ATCC and required tests performed on a fee basis charged to the NPS Permittee.

A. Cell Lines - Minimum Specifications

- 1) Post-freeze recovery and viability
- 2) Free of Mycoplasma contamination
- 3) Free of bacterial and fungal contamination
- 4) Verification of species, as reported. Tested by:
 - i. Isoenzyme analysis for non-human cell lines

B. Bacterial Cultures - Minimum Specifications

- 1) Pure culture
- 2) Viable
- 3) Verification of correct genus and species

C. Protistology - Minimum Specifications

- 1) Verification of appropriate morphology
- 2) Verification of genotype (if available), e.g. PCR-RFLP
- 3) Free of un-expected bacterial or fungal contamination

D. Animal Virology - Minimum Specifications

- 1) Free of bacterial and fungal contamination
- 2) Verification of identity, confirmed by antibody reaction, PCR, etc.
- 3) Verification of functional identity

E. Molecular Genomics Materials - Minimum Specifications

- 1) Verification of vector and/or clone identification by restriction enzyme digest
- 2) Verification of sequence

F. Mycology - Minimum Specifications

- 1) Pure culture
- 2) Viable
- 3) Verification of identity, correct genus and species

LIST OF PROHIBITED MATERIALS

The following types of materials WILL NOT BE ACCEPTED into the NPS Special Collection

- 1) Radioactive Materials
- 2) Biosafety Level-4 (BSL-4) materials
- 3) Chemicals
- 4) Live animals or insects
- 5) Toxins
- 6) Clinical Samples such as, by way of nonlimiting example:
 - i. Tissue samples
 - ii. Unscreened human or animal blood
 - iii. Tissue slides, blood smears, swabs.
- 7) Plant specimens, other than those that can be distributed “as-is”.
- 8) Materials that are scientifically irrelevant such as, by way of nonlimiting example, misidentified, contaminated, redundant, or non-viable biological materials.