AMENDMENT OF SOLIC	ITATION/MODIFICA	ATION OF CON	TRACT	1. CON	ITRACT ID CODE	PAGE (OF PAGES
2. AMENDMENT/MODIFICATION NO. 0019	3. EFFECTIVE DATE See Block 16C	4. REQUISITION/I	PURCHA	SE REQ.	5. PROJECT N	O. (If applic	
S. ISSUED BY CODE	06005	7. ADMINISTERE	D BY (If o	ther than Ite	m 6)	06005	
U.S. Department of Energy Brookhaven Site Office 53 Bell Avenue, Building 4 Upton, NY 11973-5000		Code			l		
NAME AND ADDRESS OF CONTRAC	CTOR (No. street, county, St	ate and ZIP Code)	(4)	9. A. AME	NDMENT OF SOL	ICITATION	NO.
Brookhaven Science Asso 40 Brookhaven Avenue	ociates, LLC				ED (SEE ITEM 11)		dar NO
Building 460 Upton, New York 11973-5	5000		x	DE-SCO		Jon III act On	idi NO.
opton, New York 11970-0	.000		^		ED (SEE ITEM 1	3)	
CODE N/A	FACILITY CODE NA			12/22	/2014		
11. Th	HIS ITEM ONLY APPL	IES TO AMENDM	ENTS C	OF SOLIC	ITATIONS		
A. THIS CHANGE ORDER IS ISSI ORDER NO. IN ITEM 10A.	3. THIS ITEM APPLIES ON IT MODIFIES THE CON UED PURSUANT TO: (Spe	TRACT/ORDER NO. A	S DESCR	RIBED IN ITI	EM 14.	MADE IN TI	HE CONTRACT
B. THE ABOVE NUMBERED CON	ITRACT/ORDER IS MODIFI	ED TO REFLECT THE	ADMINI	STRATIVE (CHANGES (such a	as changes	in paying office,
appropriation date, etc.) SET FC C. THIS SUPPLEMENTAL AGREE	ORTH IN ITEM 14, PURSUA	ANT TO THE AUTHOR	ORITY OF	AR 43.103(I	3).		
Mutual agreement of		TOTAL TOTAL					
D. OTHER (Specify type of modifi	ication and authority						
. IMPORTANT: Contractor . is	s not X is required to s	sign this document	and ret	urn 1 c	opies to the iss	uina offic	e.
4. DESCRIPTION OF AMENDMENT/MC							
The purpose of this Modificat I.161; Add Clause I.12A; Rev Revise Appendix D – Contrac	vise Part III, Section	J - List of Docum	nents, i	Exhibits,	and Other At	tachmen	s 1.10; 1.123 its; TOC;
15A. NAME AND TITLE OF SIGNER (Typ. Anne Troutman	oe or print)	Evelyn L	andini		RACTING OFFICE	R (Type or	print)
General Counsel 5B. CONTRACTOR/OFFEROR	15C. DATE SIG	Contract NED 16B. UNITED			CA 160	C. DATE SI	GNED
Signature of person authorized to signature	1/13/2	015 BY 6			den	7/16/	15
(Signature of person authorized to sign	an	(Signat	ure of Col	ntracting Off	icer)		ii ii

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CONTINUATION SHEET	REFERENCE NO. OF DOCUMENT BEING CONTINUED DE-SC0012704/0019	PAGE 2	OF 3	
				_

- 14. Description of Amendment/Modification (continued):
 - 1. Part II, Section I Contract Clauses, Table of Contents (TOC): Section I is revised to reflect an update to clauses I.10; I.123; I.161; Add clause I.12A.
 - 2. Part II, Section I Contract Clauses:

The following clauses have been revised; replace the prior versions with the updated provided herein:

- a. Clause I.10 FAR 52.203-14, Display of Hotline Poster(s) (2007) modified by DEAR 903.1004 (B)(2)(ii): This clause has been updated to correct the URL in paragraph (b)(3)(ii) from http://ig.energy.gov/hotline.htm to http://energy.gov/ig/services.
- b. Clause I.123 DEAR 970.5204-3, Access To And Ownership Of Records (OCT 2014) (DEVIATION): This clause has been updated to reflect the most current version IAW Policy Flash 2015-23.
- c. Clause I.161 DEAR 970.5244-1, Contractor Purchasing System (Jan 2013) (Deviation) (Deviation per Policy Flash 2011-98, Aug 2011) (Deviation per AL 2013-10, Jun 2013) (Deviation per Policy Flash 2015-17, Mar 2015): This clause has been updated to correct the CFR citation in section (x)(7) from 48 CFR 970.1504-3-1(b) to 48 CFR 22.1207.

The following clause has been added to the contract; insert the attachments provided herein:

- d. Clause I.12A FAR 52.203-99, Prohibition on Contracting with Entities that Require Certain Internal Confidentiality Agreements (MAY 2015) (Deviation): This clause is hereby added to the Contract IAW with Policy Flash 2015-22, Class Deviation.
- 3. Part II, Section I Contract Clauses, Clause I.152 DEAR 970.5232.4, Obligation of Funds: The first sentence of paragraph (a) is revised to read as follows:

The amount presently obligated by the Government with respect to this Contract is \$700,412,150.65.

The revised total reflects an increase of \$6,217,252.51 as a result of Modification 0012 through 0018 from \$694,194,898.14 to \$700,412,150.65.

Accordingly, from this Modification going forward, the obligated amount of this clause will be updated to reflect the amount in Strategic Integrated Procurement Enterprise System (STRIPES) as a result of the financial modification(s).

- 4. Part III, Section J List of Documents, Exhibits and Other Attachments: Section J is revised to reflect the following: Revise Appendix D Contractor's Commitments; Replace Appendix I DOE Directives/List B.
 - a. Appendix D Contractor's Commitments has been revised to correct the spelling of Battelle.
 - b. Appendix I DOE Directives/List B identified as Modification No. 0012 has been revised; replace the prior version with the attached Appendix I identified as Modification No. 0019. The revisions are as follows:

	SUMMARY OF DIRECTIV	E CHANGES	
ADDITIONS		CHANGE	NOTES
O 471.6 Admin Chg. 2	Information Security, 5/15/2015	Updated to latest revision	Cancels O 471.6 Admin Chg. 1
O 474.2 Admin Chg. 3	Nuclear Material Control and Accountability, 5/15/2015	Updated to latest revision	Cancels O 474.2 Chg. 2
NA SD 350.2 Rev 1	Use of Management and Operating Contractor Employees for Services to NNSA in the Washington, D.C., Area, 10/18/2012	Removed	Not required. Refer to DOE O 350.2B.

	REFERENCE NO. OF DOCUMENT BEING CONTINUED	PAGE	OF	
CONTINUATION SHEET	DE-SC0012704/0019	3	3	

Attachments:

- ➢ Section I Contract Clauses
 - ♣ 1.12A
 - **4** 1.123
- ➤ Part III, Section J List of Documents, Exhibits and Other Attachments
 ❖ Appendix I DOE Directives/List B

CLAUSE I.12A – FAR 52.203-99 - PROHIBITION ON CONTRACTING WITH ENTITIES THAT REQUIRE CERTAIN INTERNAL CONFIDENTIALITY AGREEMENTS (MAY 2015)(DEVIATION)

- (a) The contractor shall not require employees or subcontractors seeking to report fraud, waste, or abuse to sign or comply with internal confidentiality agreements or statements prohibiting or otherwise restricting such employees or subcontractors from lawfully reporting such fraud, waste, or abuse to a designated investigative or law enforcement representative of a Federal department or agency authorized to receive such information.
- (b) The contractor shall notify employees that the prohibition and restrictions of any internal confidentiality agreements covered by this clause are no longer in effect.
- (c) The prohibition in paragraph (a) of this clause does not contravene requirements applicable to Standard Form 312, Form 4414, or any other form issued by a Federal department or agency governing the nondisclosure of classified information.

(d)

- (1) In accordance with section 743 of Division E, Title VII, of the Consolidated and Further Continuing Resolution Appropriations Act, 2015 (Pub. L. 113-235), use of funds appropriated (or otherwise made available) under that or any other Act may be prohibited, if the Government determines that the contractor is not in compliance with the provisions of this clause.
- (2) The Government may seek any available remedies in the event the contractor fails to comply with the provisions of this clause.

CLAUSE I.123 – DEAR 970.5204-3 – ACCESS TO AND OWNERSHIP OF RECORDS (OCT 2014) (DEVIATION PER POLICY FLASH 2015-23)

- (a) Government-owned records. Except as provided in paragraph (b) of this clause, all records acquired or generated by the contractor in its performance of this contract, including records series described within the contract as Privacy Act systems of records, shall be the property of the Government and shall be maintained in accordance with 36 Code of Federal Regulations (CFR), Chapter XII, -- Subchapter B, "Records Management." The contractor shall ensure records classified as Privacy Act system of records are maintained in accordance with FAR 52.224.2 "Privacy Act."
- (b) <u>Contractor-owned records</u>. The following records are considered the property of the contractor and are not within the scope of paragraph (a) of this clause.
 - (1) Employment-related records (such as worker's compensation files; employee relations records, records on salary and employee benefits; drug testing records, labor negotiation records; records on ethics, employee concerns; records generated during the course of responding to allegations of research misconduct; records generated during other employee related investigations conducted under an expectation of confidentiality; employee assistance program records; and personnel and medical/health-related records and similar files), and non-employee patient medical/health-related records, except those records described by the contract as being operated and maintained by the Contractor in Privacy Act system of records.
 - (2) Confidential contractor financial information, internal corporate governance records and correspondence between the contractor and other segments of the contractor located away from the DOE facility (i.e., the contractor's corporate headquarters);
 - (3) Records relating to any procurement action by the contractor, except for records that under 48 CFR 970.5232-3 are described as the property of the Government; and
 - (4) Legal records, including legal opinions, litigation files, and documents covered by the attorney-client and attorney work product privileges; and
 - (5) The following categories of records maintained pursuant to the technology transfer clause of this contract:
 - (i) Executed license agreements, including exhibits or appendices containing information on royalties, royalty rates, other financial information, or commercialization plans, and all related documents, notes and correspondence.
 - (ii) The contractor's protected Cooperative Research and Development Agreement (CRADA) information and appendices to a CRADA that contain licensing terms and conditions, or royalty or royalty rate information.
 - (iii) Patent, copyright, mask work, and trademark application files and related contractor invention disclosures, documents and correspondence, where the contractor has elected rights or has permission to assert rights and has not relinquished such rights or turned such rights over to the Government.

- (c) Contract completion or termination. Upon contract completion or termination, the contractor shall ensure final disposition of all Government-owned records to a Federal Record Center, the National Archives and Records Administration, to a successor contractor, its designee, or other destinations, as directed by the Contracting Officer. Upon the request of the Government, the contractor shall provide either the original contractor-owned records or copies of the records identified in paragraph (b) of this clause, to DOE or its designees, including successor contractors. Upon delivery, title to such records shall vest in DOE or its designees, and such records shall be protected in accordance with applicable federal laws (including the Privacy Act) as appropriate. If the contractor chooses to provide its original contractor-owned records to the Government or its designee, the contractor shall retain future rights to access and copy such records as needed.
- (d) Inspection, copying, and audit of records. All records acquired or generated by the Contractor under this contract in the possession of the Contractor, including those described at paragraph (b) of this clause, shall be subject to inspection, copying, and audit by the Government or its designees at all reasonable times, and the Contractor shall afford the Government or its designees reasonable facilities for such inspection, copying, and audit; provided, however, that upon request by the Contracting Officer, the Contractor shall deliver such records to a location specified by the Contracting Officer for inspection, copying, and audit. The Government or its designees shall use such records in accordance with applicable federal laws (including the Privacy Act), as appropriate.
- (e) <u>Applicability</u>. This clause applies to all records created, received and maintained by the contractor without regard to the date or origination of such records including all records acquired from a predecessor contractor.
- (f) Records maintenance and retention. Contractor shall create, maintain, safeguard, and disposition records in accordance with 36 Code of Federal Regulations (CFR), Chapter XII, -- Subchapter B, "Records Management" and the National Archives and Records Administration (NARA)-approved Records Disposition Schedules. Records retention standards are applicable for all classes of records, whether or not the records are owned by the Government or the contractor. The Government may waive application of the NARA-approved Records Disposition Schedules, if, upon termination or completion of the contract, the Government exercises its right under paragraph (c) of this clause to obtain copies of records described in paragraph (b) and delivery of records described in paragraph (a) of this clause.

(g) Subcontracts.

(1) The contractor shall include the requirements of this clause in all subcontracts that contain the *Radiation Protection and Nuclear Criticality* clause at 952.223-72, or whenever an on-site subcontract scope of work (i) could result in potential exposure to: A) radioactive materials; B) beryllium; or C) asbestos or (ii) involves a risk associated with chronic or acute exposure to toxic chemicals or substances or other hazardous materials

Contract No. DE-SC0012704 Section I, Clause I.123 Modification No. 0019

that can cause adverse health impacts, in accordance with 10 CFR part 851. In determining its flow-down responsibilities, the Contractor shall include the requirements of this clause in all on-site subcontracts where the scope of work is performed in: (A) Radiological Areas and/or Radioactive Materials Areas (as defined at 10 CFR 835.2); (B) areas where beryllium concentrations exceed or can reasonably be expected to exceed action levels specified in 10 CFR 850; (C) an Asbestos Regulated area (as defined at 29 CFR 1926.1101 or 29 CFR 1910.1001); or (D) a workplace where hazard prevention and abatement processes are implemented in compliance with 10 CFR 851.21 to specifically control potential exposure to toxic chemicals or substances or other hazardous materials that can cause long term health impacts.

(2) The Contractor may elect to take on the obligations of the provisions of this clause in lieu of the subcontractor, and maintain records that would otherwise be maintained by the subcontractor.

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Section J | Appendix I
Modification No. 0019

APPENDIX I

DOE Directives/List B

Applicable to the Operations of Brookhaven National Laboratory

Contract No. DE-SC0012704 Section J | Appendix I Modification No. 0019

There is no List A to this Appendix.

List B to this Appendix contains the following:

Part I: "Directives List"

This section contains a list of Directives that are considered by DOE as applicable to the BNL contract.

DOE Directives may be found at the following address: http://www.directives.doe.gov

ISSUED	TYPE	NUMBER	THROUGH CHANGE	TITLE Includes Compliance Notes as Necessary
9/29/1995	Order	130.1		Budget Formulation
5/2/2001	Policy	141.1		Department of Energy Management of Cultural Resources
9/4/2008	Manual	142.2-1	Admin Chg. 1 6/27/13	Manual for Implementation of the Voluntary Offer Safeguards Agreement and Additional Protocol with the Internation Atomic Energy Agency
12/15/2006	Order	142.2A	Admin Chg. 1 6/27/13	Voluntary Offer Safeguards Agreement and Additional Protocol with the International Atomic Energy Agency
10/14/2010	Order	142.3A		Unclassified Foreign Visits and Assignments Program
3/31/2014	Order	150.1A		Continuity Programs
11/2/2005	Order	151.1C		Comprehensive Emergency Management System
6/27/2007	Order	153.1		Departmental Radiological Emergency Response Assets
12/23/2008	Order	200.1A		Information Technology Management
1/7/2005	Order	203.1		Limited Personal Use of Government Office Equipment Including Information Technology
5/8/2001	Policy	205.1		Departmental Cyber Security Management Policy
5/16/2011	Order	205.1B	Admin Chg. 3 4/29/14	Department of Energy Cyber Security Program
4/17/2006	Manual	205.1-3	Admin Chg. 1 12/20/12	Telecommunication Security Manual
1/16/2009	Order	206.1		Department of Energy Privacy Program
2/19/2013	Order	206.2		Identity, Credential and Access Management (ICAM)
4/8/2011	Order	210.2A		DOE Corporate Operating Experience Program
4/19/2008	Order	221.1A		Reporting Fraud, Waste, and Abuse to the Office of Inspector General
2/25/2008	Order	221.2A		Cooperation with the Office of Inspector General
3/4/2011	Order	225.1B		Accident Investigations
8/30/2011	Order	227.1		Independent Oversight Program
6/27/2011	Order	231.1B	Admin Chg. 1 11/28/12	Environment, Safety and Health Reporting
8/30/2011	Order	232.2	Admin Chg. 1 3/12/14	Occurrence Reporting and Processing of Operations Information
12/13/2010	Order	241.1B		Scientific and Technical Information Management
3/11/2013	Order	243.1B		Records Management Program
2/2/2006	Order	243.2		Vital Records
2/23/2011	Order	252.1A	Admin Chg. 1 3/12/13	Technical Standards Program

DOE Directives may be found at the following address: http://www.directives.doe.gov

	ally to a sale	100/25/10-2-25		Management and Funding of the Department's Overseas
11/19/2009	Order	313.1		Presence
10/18/2007	Order	341.1A Parts: 1.(a-b) 2.a(1-3) 2.a(4)(a-h)		Federal Employee Health Services
2/23/2010	Order	350.1	Chg. 5 9/30/14	Conractor Human Resource Management Programs
9/29/2014	Order	350.3		Labor Standards Compliance, contractor Labor Relations, and Contractor Workforce Restructuring Programs
5/31/2011	Order	350.2B		Use of Management and Operating or Other Facility Management Contractor Employees for Services to DOE in the Washington D.C Area
4/14/2014	Policy	364.1		Health and Safety Training Reciprocity
8/17/2009	Order	410.2	Admin Chg. 1 4/10/14	Management of Nuclear Materials
4/21/2005	Order	412.1A	Admin Chg. 1 6/21/14	Work Authorization System
10/28/2008	Order	413.1B		Internal Control Program
4/19/2006	Order	413.2B	Admin Chg. 1 1/31/11	Laboratory Directed Research and Development
11/29/2010	Order	413.3B		Program and Project Management for the Acquisition of Capital Assets
4/25/2011	Order	414.1D	Admin Chg. 1 5/8/13	Quality Assurance
12/3/2012	Order	415.1		Information Technology Project Management
2/8/2011	Policy	420.1		Department of Energy Nuclear Safety Policy Compliance Note: Only applicable to BNL facilities categorized as Hazardous Category 1,2 or 3 nuclear facilities
12/4/2012	Order	420.1C		Facility Safety Compliance Note: Chapters 1, 3, and 5 are applicable to BNL facilities categorized as hazardous category 1, 2, or 3 nuclear facility is proposed by BNL and approved by DOE
7/21/2011	Order	420.2C		Safety of Accelerator Facilities
6/29/2010	Order	422.1	Admin Chg. 1 6/25/13	Conduct of Operations Compliance Note: Applicable to Hazardous Category 1, 2, or 3 nuclear facilities and other facilities as defined by BSA in a Program Plan to be approved by BHSO for incorporating

DOE Directives may be found at the following address: http://www.directives.doe.gov

4/16/2010	Order	425.1D	Admin Chg. 1 4/2/13	Verification of Readiness to Start Up or Restart Nuclear Facilities Compliance Note: Only applicable to BNL facilities categorized as Hazardous Category 1, 2, or 3 nuclear facilities
4/21/2010	Order	426.2	Admin Chg. 1 7/19/13	Personnel Selection, Training, Qualification, and Certification Requirements for DOE Nuclear Facilities
11/7/2013	Policy	434.1A		Conduct and Approval of Select Agent and Toxin Work at Department of Energy Sites
7/9/1999	Order	435.1	Admin Chg. 1 8/28/01	Radioactive Waste Management
7/9/1999	Manual	435.1-1	Admin Chg. 1 6/19/01	Radioactive Waste Management Manual
5/2/2011	Order	436.1		Departmental Sustainability
11/27/2002	Order	440.2C	Admin Chg. 1 6/22/11	Aviation Management and Safety
3/7/2008	Manual	441.1-1		Nuclear Material Packaging Manual
6/6/2001	Order	442.1A		Department of Energy Employee Concerns Program
7/29/2011	Order	442.1A		Differing Professional Opinions for Technical Issues Involving Environment, Safety and Health
3/7/2011	Order	443.1B		Protection of Human Research Subjects
4/25/2011	Policy	450.4A		Integrated Safety Management Policy
7/21/2011	Order	452.8		Control of Nuclear Weapon Data
5/31/2011	Order	456.1	Admin Chg. 1 2/14/13	The Safe Handling of Unbound Engineered Nanoparticles
9/15/2005	Policy	456.1		Secretarial Policy Statement on Nanoscale Safety
2/11/2011	Order	458.1	Admin Chg. 3 1/15/13	Radiation Protection of the Public and the Environment
5/14/2010	Order	460.1C		Packaging and Transportation Safety
12/22/2004	Order	460.2A		Departmental Material Transportation and Packaging Managemen
6/4/2008	Manual	460.2-1A		Radioactive Material Transportaion Practices Manual
11/10/2008	Order	462.1	Admin Chg. 1 7/10/13	Import and Export of Category 1 and 2 Radioactive Sources Aggregated Quantities
12/29/2010	Policy	470.1A		Safeguards and Security Program
8/12/2008	Order	470.3B		Graded Security Protection (GPS) Policy
7/21/2011	Order	470.4B		Safeguards and Security Program
1/16/2009	Manual	470.4-4A	Admin Chg. 1 10/12/10	Information Security Manual Compliance Note: This Directive is cancelled by Order 471.6 except for Section D - Technical Surveillance Countermeasures which will be retained in its entirety.

DOE Directives may be found at the following address: http://www.directives.doe.gov

6/2/2014	Order	470.5	A STATE OF THE STATE OF	Insider Threat Program
3/1/2010	Order	471.1B		Identification and Protection of Unclassified Controlled Nuclear Information
4/9/2003	Order	471.3	Admin Chg. 1 1/13/11	Identifying and Protecting Official Use Only Information
4/9/2003	Manual	471.3-1	Admin Chg. 1 1/13/11	Manual for Identifying and Protecting Official Use Only Information
6/20/2011	Order	471.6	Admin Chg. 2 5/15/15	Information Security Compliance Note: This Directive contains a Partial deletion of Manual 470.4-4A
7/27/2011	Order	472.2	Admin Chg. 1 10/8/13	Personnel Security
6/27/2011	Order	473.3		Protection Program Operations
6/27/2011	Order	474.2	Admin Chg. 3 5/15/15	Nuclear Material Control and Accountability
12/10/2004	Order	475.1		Counterintelligence Program
10/3/2014	Order	475.2B		Identifying Classified Information
1/3/2001	Manual	481.1-1A	Admin Chg. 1 9/28/01	Reimbursable Work for Non Federal Sponsored Process Manual
11/6/2013	Order	483.1A		DOE Cooperative Research and Development Agreements
8/17/2006	Order	484.1	Admin Chg. 2 6/30/14	Reimbursable Work for the Department of Homeland Security
11/3/2004	Order	522.1		Pricing of Departmental Materials and Services
1/6/2003	Order	534.1B		Accounting
4/2/2012	Order	551.1D		Official Foreign Travel
3/30/2012	Order	580.1A	Admin Chg. 1 10/22/12	Department of Energy Personal Property Management Program