1552.203-72 Scientific integrity.

As prescribed in 1503.1071, insert the following clause:

Scientific Integrity (Month Year)

(a) *Applicability.* This contract will require the Contractor to perform, communicate, or supervise scientific activities or use scientific information to perform advisory and assistance services. When performing, communicating, supervising, or utilizing scientific activities or scientific information, the Contractor must adhere to the EPA's Scientific Integrity Policy.

(b) *Definitions.* The following definitions apply:

Advisory and assistance services (*see* 48 CFR 2.101).

Scientific activities means those activities leading to the systematic knowledge of the physical or material world, largely consisting of observation and experimentation. It also includes the supervision, utilization, and communication of these activities.

Scientific information means factual inputs, data, models, analyses, technical information, or scientific assessments related to such disciplines as the behavioral and social sciences, public health and medical sciences, life and earth sciences, engineering, or physical sciences. This includes any communication or representation of knowledge, such as facts or data, in any medium or form, including textual, numerical, graphic, cartographic, narrative, or audiovisual forms. This definition includes information that an agency disseminates from a web page but does not include the provision of hyperlinks on a web page to information that others disseminate. This definition excludes opinions, where the agency's presentation makes clear that an individual's opinion, rather than a statement of fact or of the agency's findings and conclusions, is being offered.

Scientific Integrity means the adherence to professional values and practices, that is, the codes of ethics and behaviors in the scientists' fields of study, when conducting, supervising, communicating, and utilizing the results of science and scholarship. It ensures objectivity, clarity, reproducibility, and utility. It also provides insulation from bias, fabrication, falsification, plagiarism, improper outside interference, and censorship.

(c) *Compliance with policy.* Prior to beginning performance under this contract, the Contractor must ensure that all personnel within their organization, including subcontractors and consultants, that perform, communicate, or supervise scientific activities, or use scientific information to perform advisory and assistance services under this contract, have read and understand their compliance responsibilities with the *EPA's Scientific Integrity Policy.* This requirement applies to any personnel that will supervise, conduct, utilize, or communicate scientific activities or scientific information. Examples of such scientific activities include, but are not limited to, computer modeling, economic analysis, field sampling, laboratory experimentation, demonstrating new technology, statistical analysis, and writing a review article on a scientific issue.

(1) Consistent with the objective of promoting a culture of scientific integrity and transparency, as discussed in the EPA's Scientific Integrity Policy, the Contractor agrees to:

(i) Produce scientific products of the highest quality, rigor, and objectivity, by adhering to applicable EPA information quality policy, quality assurance policy, and peer review policy;

(ii) Prohibit suppressing, altering, or otherwise impeding the timely release of scientific findings or conclusions;

(iii) Adhere to the *Peer Review Handbook,* current edition, for the peer review of scientific and technical work products generated through this contract;

(iv) Act honestly and refrain from acts of research misconduct, including publication or reporting, as described in EPA Order 3120.5 Policy and Procedures for Addressing Research Misconduct. Research misconduct does not include honest error or differences of opinion;

(v) Require that reviews of the content of a scientific product be based only on scientific quality considerations, *e.g.,* the methods used are clear and appropriate, the presentation of results and conclusions is impartial;

(vi) Ensure scientific findings are generated and disseminated in a timely and transparent manner, including scientific research performed by subcontractors and consultants who assist with developing or applying the results of scientific activities;

(vii) Include an explication of underlying assumptions, accurate contextualization of uncertainties, and a description of the probabilities associated with both optimistic and pessimistic projections when communicating scientific findings, if applicable;

(viii) Document the use of independent validation of scientific methods; and

(ix) Document any independent review of the Contractor's scientific facilities and testing activities, as occurs with accreditation by a nationally or internationally recognized sanctioning body.

(2) To assure protection of Contractor staff supported by this contract, consistent with the objectives described in the EPA's Scientific Integrity Policy, the Contractor agrees to:

(i) Prohibit attempted or actual intimidation or coercion of scientists to alter scientific data, findings, or professional opinions or non-scientific influence of scientific advisory boards. In addition, the Contractor agrees to inform its employees, subcontractors, and consultants, including scientists and managers, of their responsibility not to knowingly misrepresent, exaggerate, or downplay areas of scientific uncertainty; and

(ii) Prohibit retaliation or other punitive actions toward employees who uncover or report allegations of scientific and research misconduct, or who express a differing scientific opinion. The Contractor must afford employees who have allegedly engaged in scientific or research misconduct the due process protections provided by law, regulation, and applicable collective bargaining agreements, prior to any action. The Contractor must ensure that all employees, subcontractors, and consultants are familiar with these protections and avoid the appearance of retaliatory actions.

(d) *Loss of Scientific Integrity.* If during performance of this contract the Contractor becomes aware of an actual or suspected loss of scientific integrity, the Contractor must immediately inform the Contracting Officer and the Contracting Officer's Representative with a description of the actual or suspected issue in writing. If the actual or suspected loss of scientific integrity is by an EPA employee, the Contractor may inform the Agency's Scientific Integrity Official, in addition to the Contracting Officer and Contracting Officer's Representative. The Contractor must ensure that its employees are aware of their responsibility to immediately report any actual or suspected loss of scientific integrity to the Contractor, who must communicate it to the EPA in writing. The Contracting Officer and the Contracting Officer's Representative must consult with the Agency's Scientific Integrity Official on all issues related to an actual or suspected loss of scientific integrity

under this contract and with the EPA Office of Inspector General (OIG), in accordance with EPA Order 3120.5 *Policy and Procedures for Addressing Research Misconduct,* on all issues related to research misconduct. The Agency's Scientific Integrity Official and/or OIG must advise the Contracting Officer and Contracting Officer's Representative on the appropriate remedy for any actual or suspected loss of scientific integrity. The Contractor bears the primary responsibility for prevention and detection of research misconduct and for the inquiry, investigation, and adjudication of research misconduct alleged to have occurred under the contract in association with its own institution. However, the EPA retains the ultimate oversight authority for the EPA-supported research. The Contractor must take the actions required as described in EPA Order 3120.5 *Policy and Procedures for Addressing Research Misconduct* when research misconduct is suspected or found under its contract.

(e) *Remedies.* The Contracting Officer in consultation with the Scientific Integrity Official and OIG, if applicable, will make the final determination on any remedy to an actual or suspected loss of scientific integrity. Potential remedies include:

(1) Acceptance of the Contractor's proposed mitigation plan to the scientific integrity issue;

(2) Acceptance of an alternate mitigation plan negotiated by the parties listed in the first paragraph of this section;

(3) Termination for convenience, in whole or in part, if no mitigation plan will adequately resolve the actual or suspected loss of scientific integrity; or

(4) Termination for default or cause, in whole or in part, if the Contractor was aware of an actual or suspected loss of scientific integrity under this contract and did not disclose it or misrepresented relevant information to the EPA. Additionally, the Government may debar or suspend the Contractor from Government contracting or pursue other remedies as may be permitted by law or this contract.

(5) *Opportunity to Respond*—If the party who has been accused of a loss of scientific integrity feels that the Agency has reached an incorrect conclusion or the Contracting Officer has applied an inappropriate remedy, the party may provide a written response to the Contracting Officer, Scientific Integrity Official, and/or OIG.

(f) *Subcontractors and Consultants.* The Contractor agrees to insert language in any subcontract or consultant agreement placed hereunder which must conform substantially to the language of this clause, including this paragraph (f), unless otherwise authorized in advance in writing by the Contracting Officer.

(g) *Additional Resources.* For more information about the EPA's Scientific Integrity Policy, an introductory video can be accessed at: *https://youtu.be/FQJCy8BXXq8.* A training video is available at: *https://youtu.be/Zc0T7fooot8.*

(End of clause)

Parent topic: Subpart 1552.2—Texts of Provisions and Clauses