

<b>PPPL</b>	<b>Princeton Plasma Physics Laboratory</b>	<b>PROCEDURE</b>	<b>GEN-037 Page 1 of 5</b>
<b>Subject:</b>  <b>PPPL Invention Disclosure Procedure</b>	<b>Effective Date:</b>  January 3, 2014	<b>Initiated by:</b>  Head, Best Practices and Outreach	
	<b>Supersedes:</b>  NEW	<b>Approved:</b>  Director	

**Management System (Primary):** 02.00 Mission Delivery  
**Management System Owner:** Deputy Director for Research  
**Management Process:** 02.15 Inventions and Patents  
**Process Owner:** Deputy Director for Research  
**Sub-Process:** 02.15.01 Inventions Disclosure  
**Sub-Process Owner:** Head, Best Practices and Outreach  
**Subject Matter Experts (SMEs):** Head, Best Practices and Outreach; Head, Technology Transfer

### APPLICABILITY

This procedure applies to all PPPL projects, departments, staff and activities; and to all visitors involved with research, discoveries, and inventions at the Laboratory that may generate intellectual property and inventions.

### INTRODUCTION

The Department of Energy and Princeton University, through the Contract DE-AC02-09CH11466 and the Bayh-Dole Act of 1980, have specific rights to Intellectual Property for all work developed under this contract.

When there is an invention or new discovery at the Laboratory, the Inventors are required to disclose the invention using the appropriate Invention Disclosure form. This form is used to inform the Laboratory, the Princeton University Office of Technology Licensing & Intellectual Property (PU-OTL), and the Department of Energy (DOE) of the inventions and discoveries made at the Laboratory. This is the starting point for preparing Intellectual Property protection in the form of patents or copyrights, should the Princeton University Office of Technology Licensing & Intellectual Property or the Department of Energy (DOE) decide to protect those inventions. PPPL employees are obligated to assign title (ownership) to any invention to Princeton University or, to the DOE if Princeton University declines title. In the event that both Princeton University and the DOE decline title to the invention the PPPL employee has the option to request a waiver from both Princeton University and the DOE and take title to the invention. If a waiver is granted, the employee may file or continue prosecution for those patent applications on their own or through their own private patent agent/attorney. Any royalties derived from patented inventions are distributed according to the Princeton University Patent Policies or according to 15 USC 3710c if the DOE owns the patent.

The Invention Disclosure Form is an important legal document that starts the patent process by identifying various aspects of the invention that is being considered for patenting. The form briefly describes the invention and its achieved advantages, date of conception, and novel features. The Invention Disclosure also includes (but is not limited to) design sketches, funding source, related or referenced publications or patents, laboratory notebook entries, information on the contributing collaborators, and public disclosure information. The Invention Disclosure is also very important because it officially starts the process of expert review of the invention to determine whether patent protection will be sought. **The Invention Disclosure is NOT a patent application and therefore should not be made public.**

**REFERENCES**

DOE Contract No. DE-AC02-09CH11466

DEAR 970.227-10 Patent Rights

Federal Technology Transfer Legislation and Policy Handbook

Title 15 USC, Commerce and Trade, Section 3710c

Title 35 USC 203 Patents

O-047 Patent Committee Charter

The Bayh-Dole Act of 1980 P.L. 96-517

Princeton University Policy Web site:

[http://www.princeton.edu/dof/policies/publ/fac/rules\\_toc/chapter8/#comp000045d572a900000003d24af9](http://www.princeton.edu/dof/policies/publ/fac/rules_toc/chapter8/#comp000045d572a900000003d24af9)

**DEFINITIONS & ACRONYMS****Non-Disclosure Agreement (NDA)**

Occasionally, it is necessary for inventors to discuss their ideas with non-PPPL Collaborators. In that case a Non-Disclosure Agreement is required to protect the Intellectual Property. A non-disclosure agreement (NDA) is a legally binding contract between at least two institutions (e.g., between Princeton University and one or more institutions), that governs the protection of information considered to be proprietary by at least one of the institutions. The terms and conditions of the NDA may specify (among other things) the information to be protected, and the circumstances under which it is protected. An NDA can only be arranged by the Princeton University Office of Technology Licensing & Intellectual Property (PU OTL). The Head of Technology Transfer can help arrange an NDA.

**Patentability**

The three basic requirements for a patentable invention are novelty, non-obviousness, and usefulness. Generally speaking, an invention is useful if it has a functional purpose, is operable, and is of some benefit to society. A novel invention is one that is not known to the public. In general, an invention will NOT meet the novelty requirement if:

- It was known to the public;
- It was described in a publication or patent;
- It was used publicly, or offered for sale prior to the application filing date.

In addition, the invention must be non-obvious. This means that the invention must not be obvious to one of ordinary skill in the art and is a determination made by the U.S. Patent and Trademark Office by comparing the invention to the prior art (such as publications related to elements of the invention, including the inventor's own publications). To help meet this requirement, it is important that the inventor make sure the patent attorney or agent working on the application has a good understanding of the invention and is provided with any prior art known to the inventors. This will allow the patent application to be drafted so that the invention is clearly distinguishable from prior art.

**Patent Committee**

The Patent Committee, appointed by the Director and Chaired by the Head of Technology Transfer, is responsible for the administration of PPPL's inventions and patent program in accordance with O-047.

### PROCEDURE

#### Responsibility

#### Action

- |                               |  |
|-------------------------------|--|
| PPPL Inventor                 | <ol style="list-style-type: none"> <li>1. Ensures a Non-Disclosure Agreement is in place prior to any collaboration effort with non PPPL collaborators.</li> <li>2. Fills out the Princeton University Invention Disclosure Form for any new invention or new discovery.</li> <li>3. Lists all names and contact information for each of the inventors if more than one inventor is involved.</li> <li>4. Obtains signatures on form for Inventors listed on the form.</li> <li>5. Obtains signature on form for “Witness” from someone other than an inventor who is familiar with the invention.</li> <li>6. Records the Cost Center under which the work was performed. If the work was done under LDRD funding, record “LDRD”.</li> <li>7. Submits form with signature(s) and any pertinent material to PPPL Publications Office.</li> </ol> |
| PPPL Publications Office      | <ol style="list-style-type: none"> <li>8. Publications Offices assigns Invention Disclosures an “M” record number, enters the disclosure into the database and gives the disclosures to the Chair of the Patent Committee for assessment.</li> <li>9. Obtains the B&amp;R Code from the Budget office and notes that on the Princeton University Invention Disclosure Form next to the Cost Center.</li> </ol>   |
| Chair of the Patent Committee | <ol style="list-style-type: none"> <li>10. Assigns a Committee Member to review the PPPL invention disclosure for completeness, technical and scientific feasibility. Member does not make patentability determination.</li> </ol>   |
| Committee Member              | <ol style="list-style-type: none"> <li>11. Reviews Invention Disclosure and notifies Publications Office or returns disclosure to Inventor with comments for changes. Signs off on Invention Disclosure form over the “Forward” line and returns signed form to Publications Office. Also signs off on form as “Witness” if appropriate.</li> </ol>  |
| PPPL Publications Office      | <ol style="list-style-type: none"> <li>12. Records the Invention Disclosure review in the Patents database, forwards a PDF copy of the Disclosure together with any background material submitted, to the PU OTL and copies the Head, Technology Transfer.</li> </ol>  |
| PU OTL                        | <ol style="list-style-type: none"> <li>13. Assigns a PU number to the invention and forwards the disclosure to the DOE within 2 months of receiving the Invention Disclosure from the inventors.</li> </ol>  |

PU OTL

14. Sends a notice to PPPL Inventor(s), Publications Office and Head of Technology Transfer, of receipt of the Invention Disclosure with advice for maintaining patentability.
15. Determines whether or not to apply for patent protection (or Copyright for software inventions), or returns (waives) the invention to the Department of Energy Patent Counsel in DOE Chicago. Sends a notice to PPPL Inventor, Publications Office and Head of Technology Transfer of waiver. Notifies DOE of any election decision within 2 years of sending the Invention Disclosure to DOE.
16. Files patent application(s) with the USPTO within 1 year of electing patent rights with DOE
17. Copies DOE, PPPL Inventor, Publications Office and Head of Technology Transfer with Provisional Patent Application or a full Patent Application if patent protection is pursued.
18. Works closely with inventors on patent application preparation by patent attorney or patent agent.
19. If patent is issued sends notice to DOE, PPPL Inventor, Publications Office and Head of Technology Transfer.

DOE Patent Counsel

20. Assigns a DOE number to the Invention Disclosure.
21. Sends acknowledgement of receipt of Invention Disclosure to PU OTL.
22. Determines whether or not to apply for patent protection. If the decision is to pursue patent protection, sends notice to PU OTL, PPPL Inventor(s), and PPPL Head of Technology Transfer.
23. Contacts inventor(s) on patent application preparation by patent attorney or patent agent for greater detail of information.
24. If patent is issued, sends notice to PU OTL, PPPL Inventor, and PPPL Head of Technology Transfer.

PPPL Inventor

25. Requests retention of Patent Rights waivers from both Princeton University and the Department of Energy if Inventor desires to pursue a patent on their own and no patent or copyrights have been applied for.

**TRAINING (SECTION REQUIRED FOR ALL PROCEDURES)**

Author

1. Specifies the appropriate training methods and means (below) and obtains concurrence of the Management System Owner and the Management Process Owner.

Target Audience: Potential Inventors, Department Heads, Publications Office  
Patent Committee Members

Instructor: Head of Patent Committee

Training Method:  
X Read only  
X Email distribution only

Frequency:  
X Once only  
X Other: New Hires, new Patent Committee Members

**RECORDS REQUIREMENTS SPECIFIC TO THIS PROCEDURE**

Records Custodians must assure records are maintained as follows:

<b>Record</b>	<b>Record Custodian</b>	<b>Location</b>	<b>Retention Time</b>
Patent Licensing Records	Publications Office	Publications Office	Destroy 25 years after issuance of patent
Patent Case Files	Publications Office	Publications Office	Destroy when 25 years old

**ATTACHMENTS**

- 1 Princeton University Invention Disclosure Form Instructions
- 2 Princeton University Invention Disclosure Form

Dear \_\_\_\_\_,

Attached is the Princeton University Invention Disclosure form. Please have all the Inventors fill out the full names, addresses and telephone numbers and have all Princeton University and PPPL Inventors sign the form.

On the Princeton University Invention Disclosure form, please put down the Cost Center that you were working on when you developed the concept. If it was an LDRD account, just put down LDRD.

If you have any questions, please contact me.

After you have the forms completed, you can bring them to the Publications Office, Room B358 LOB 3rd floor. x 2245.

Thank you,

Lew Meixler  
PPPL Head of Technology Transfer

<http://www-local.pppl.gov/forms.html>

## PRINCETON UNIVERSITY

## INSTRUCTIONS FOR INVENTION DISCLOSURE FORM

This Invention Disclosure Form is for use by University Faculty, Staff, and Students to report the creation of intellectual property. It should be used for all inventions, as well as for computer software. It is designed to provide the Office of Technology Licensing and Intellectual Property with sufficient preliminary information to open a file and initiate the case review process. This form must be completed in its entirety, signed by the inventors and forwarded to the Office of Technology Licensing and Intellectual Property, where it will be assigned a Docket Number and assigned to a Case Manager for review.

The requested information is as follows:

1. **Disclosure Title:** The title should be a general one. It may be changed by the patent attorney if a patent is filed.
2. **Sponsorship:** Once we have a completed form, this Office fulfills your responsibility of reporting the invention to your sponsors. You must supply all cost centers for any Government, Corporate or Foundation support.
3. **Publications, Oral Presentations, Poster Sessions, and Web Postings:** Provide key dates in the disclosure of the technology including all past and future dates of publications and presentations. For a United States patent, you have up to a year to file the application after any such disclosure. For foreign patent coverage, however, the patent application must be filed **BEFORE** any such disclosure. Failure to do so will mean a loss of all potential foreign patent rights.
- 4.-8. **Explanation of the Invention:** These sections are designed to help outline the parameters of the invention.
9. **Experimental Verification:** Please indicate if you have run experiments to verify that the invention works, and if you have constructed a prototype device.
10. **References:** It is extremely important to attach copies of any publication by you related to this invention. Rough or first drafts of papers, preprints, experimental data sheets, are all important to include, in the event that we need to file a patent quickly due to a emergent publication or presentation.
11. **Material Transfer Agreements (MTAs):** Some Material Transfer Agreements may contain Intellectual Property clauses that define ownership or contain restrictions on commercialization. It is important to note any MTA on this form that pertains to the invention.
12. **Possible Means of Commercialization:** Please provide your ideas on the most likely commercial path for the invention.
13. **Potential Licensees:** Please provide any industry contacts that you have made and companies or industry areas that you believe would have an interest in the invention.

**If you have an immediate publication or presentation date and gathering the attachment materials would delay the submission of this form to this Office, please submit it immediately, and provide the attachment materials as soon as possible afterwards.**

**The completed form can be mailed or delivered to:** The Office of Technology Licensing and Intellectual Property, 4 New South Building, Princeton, NJ 08544-0036.



**4. Category and General Description.** Is the invention a new process, composition of matter, a device, or one or more products? A new use for, or an improvement to, an existing product or process?

**5. Utility.** What are possible uses for the invention? In addition to immediate applications, are there any other uses that might be realized in the future?

**6. Novelty.** Pick out and expand on novel and unusual features. How does the invention differ from present technologies currently being used in industry? What problems does it solve, or what advantage does it possess?

**7. Method of Synthesis, Assembly, or Process.** If the invention is a composition of matter, a device, or a product, how is it made? If the invention is a process, what are the steps involved?

**8. Limitations.** Does this invention possess disadvantages or limitations? Can they be overcome? How?

**9. Experimental Verification.** Have you tested the invention experimentally? YES \_\_\_ NO \_\_\_ If yes, describe below. Have you constructed a prototype, model, or test samples which are available for examination? YES \_\_\_ NO \_\_\_ If yes, describe below.

**10. References.** Are you aware of any inventions or publications by others that are related to this invention? Please attach copies of any documents that you have. Label this as Attachment C.

**11. MTAs.** Was the invention made with any material or biological substance obtained through a Material Transfer Agreement? Please provide the name of the provider, their affiliation and a copy of the Agreement as Attachment D.

**Princeton University Invention Disclosure Form****Attachment 2**

**12. Possible Means of Commercialization.** How do you envision that the invention might be used in a commercial product or a process for producing a product? What advantages does this invention have over existing technologies?

**13. Potential Licensees.** Have you described the invention to any industry representatives? Did you describe it in a specific or a general fashion? Please provide the names and contact information for the people that you spoke to. Do you know of any other companies that might be interested?

**14. Abstract.** Please provide a brief (less than one page) abstract of the invention. NOTE, THIS ABSTRACT IS INTENDED FOR MARKETING PURPOSES UNDER NONCONFIDENTIAL SITUATIONS. While it is important to include the novel nature of the invention, a general description, intended or proposed uses and utility, the abstract must be a NON-ENABLING DISCLOSURE. Please DO NOT include the essential elements which would allow someone to practice the invention or reproduce the material without a license.

I (We) hereby assign all right, title and interest to this invention to Princeton University and agree to execute all documents as requested, assigning to Princeton University our rights in any patent application filed on this invention, and to cooperate with the Princeton University Office of Technology Licensing and Intellectual Property in the protection of this invention. Princeton University will share any royalty income derived from the invention with the inventor(s) in accordance with the Princeton University Patent Policy.

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Inventor's Signature

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Print Name

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Date

**Forwarded by (Patent Committee)**