

Chapter 4 ACT-I Program

4.1 ACT-I

4.1.1 ACT-I Overview

Key points and characteristics of ACT-I (Advanced Information and Communication Technology for Innovation) are discussed below.

- a. ACT-I is to consist of original and challenging proposals and its research endeavors are expected to attain high quality developments by the international standards over the coming decades. It will promote informatics research toward state-defined strategic objectives that is likely to generate new values necessary for scientific and technological innovations.
- b. ACT-I finds out and supports talented younger informatics pioneers who are willing to provide solutions, through innovative imagination, for various challenges that humanity is facing today and/or will face tomorrow, and to establish their identity as identity. This fiscal year's solicitation is limited to individual researchers who are less than 35 years' old as of April 1, 2017. It is also open to students in graduate programs. We are also looking forward to have exciting proposals from graduate students and younger researchers affiliated to companies.
- c. Individual Researchers are expected to manage their own research projects responsibly and to accomplish goals set forth in their description, so as to contribute to the overall research area to which they belong. When applicants are students, their academic supervisors will also be assigned for accountability by the ACT-I research contract agreement. For more details, please see "4.2.4 Proposal Submission Requirements (1) Requirements for Research Project Applicants" in the Application Guidelines.

Each research areas are of ACT-I program is overseen by a Research Supervisor, who manages Individual Researchers and oversees the research area as a virtual research institute.

- d. The Research Supervisor, in his/her role as the director of a virtual research institute, enlists the cooperation of Research Area Advisors and others in managing his/her research areas through the following activities.
 - Specification of a management direction for his/her research area
 - Research project selection
 - Refinement and approval of research plans (including research budgets)
 - Holding research area meetings at which Individual Researchers report on their research progress and have their results discussed, visiting labs where their research is being performed, and taking other opportunities as well to communicate with Individual Researchers and provide them with advice and guidance on their efforts.
 - Research project evaluation
 - Other activities necessary to support research activities in various ways

4.1.2 Program Scheme of ACT-I

(1) Research and Development Period

The research and development (R&D) period is to run up to 18 months, between October 2017 and March 2019 (i.e., the close of the second fiscal year).

This one-and-a-half-year period is standard in research and development for ACT-I. However, if a researcher, whose proposal has been adopted, wants an extension, a supplementary support (or an acceleration phase) may be granted for a maximum period of two years in addition to the standard period. A benchmark for an acceleration phase is supposed to be about a third of the number of issues at proposal adoption. Priority is given to research issues that are expected to result in far greater achievements if they are supported continually. The researcher assesses whether this acceleration phase must be requested, and applies for it before progress evaluation, which is performed about a year after the R&D begins. For an acceleration phase, a new contract is concluded for a maximum period of two years, after the day following the end of the research.

Note: Actual research periods depend on research project plans. For more details, please refer to “5.2 Common subject matters of After Selection: Proceeding with Research Work”.

(2) Research Budgets

In principle, a standard budget for an issue is JPY 3 million (direct expense) per year for a R&D period within one and a half years, and a maximum budget is about JPY 5 million. An applicant must state his/her reasons clearly in the proposal if the budget exceeds JPY 3 million.

If the researcher wants additional support (acceleration phase) after this R&D period of one and a half years, he/she may submit an application before progress evaluation, which is performed in about a year after the research begins, to receive a maximum amount of approximately JPY 10 million (direct expense) annually.

JST, under contract research agreements, pays research institutions funds up to 30% of research budget (direct cost) to cover overhead cost (indirect cost).

Note: Proposed research budgets are examined in the selection process. Actual research budgets are determined through examination and approval of research project planning. For more details, please refer to “5.2 Common subject matters of After Selection: Proceeding with Research Work”.

(3) Research Organization

- a. The researcher will pursue his/her research as an individual (alone). (When necessary, however, a research assistant may be appointed and paid for out of the research budget.)
- b. JST conducts activities necessary for supporting research. Examples of the matters they may address include research labs and approaches, research-related public relations and outreach activities, and applications for patents.
- c. Decisions with regard to research labs will be made with consideration of research details and research environments, and will be based on consultations with the researcher and the research institution where

research work will be performed. It is possible for research work to be performed outside of the research institute with which the researcher is affiliated.

- d. The program is open to student researchers in master's and doctoral education programs. For more details, please see "4.2.4 Application Requirements" in the Application Guidelines.
- e. If Individual Researchers without any institutional affiliation are judged to be capable of securing a proper environment and conducting research responsibly, JST may employ and enable them to carry out activities within a receiving institution. JST will, however, examine the necessity of such an arrangement very rigorously and will preclude students from any consideration for JST employment.

4.1.3 Program Flow of ACT-I

(1) Solicitation and Selection of Proposals

JST solicits research proposals for individual research areas specified among the Strategic Objectives designated by the national government. Selection of proposals is made by the Research Supervisor, with the cooperation of Research Area Advisors and others, for individual research areas.

Note: For more details, please refer to "4.2 Solicitation and Selection of Proposals."

(2) Research Plan Preparation

Once a proposal has been selected, the researcher prepares an overall research plan covering the entire period of the research project (up to 18 months). The researcher also prepares annual research plans for each year of the project. Research plans cover budgets and research approach.

Note: For more details, please refer to "5.2.1 Preparing a Research Plan."

(3) Agreements

In advancing a research project, JST will enter into a contract research agreement with the research institution where the researcher will pursue his/her research work.

Note: For more details, please refer to "5.2.2 Research Agreements".

(4) Research Work

Research work is to be performed in a one year and four month period or shorter duration that starts in October 2017 and ending in March 2019 (i.e. at the end of FY2018) or earlier. Although this is a standard R&D period for ACT-I, an additional support, (or an acceleration phase) may be received for about a third of the number of issues at proposal adoption, if the researcher, whose proposal is adopted, wants it. Concerning the acceleration phase, priority is given to research issues that are expected to result in far greater achievements, if supports are given to the research continually. Those projects that apply for and are accepted into the acceleration phase will be allowed to continue research, with an increased budget, for up to two years from April 2019.

(5) Evaluation

With cooperation from the research area advisors, a research supervisor performs a post-project evaluation of all issues in the final year of the R&D period. Aside from the issue evaluation, a research area evaluation are performed for each research area and summaries.

If a researcher, whose proposal is adopted, wants an acceleration phase, a separate progress evaluation is performed in about a year after the beginning of the research. This acceleration phase aims to determine the issues for additional support; the overall assessment is based on progress and achievements of the research; and a research area advisor agrees with the effectiveness of additional support.

Note: For more details, please refer to “5.2.7 Project Evaluations” and “5.2.8 Research Area Evaluations.”

4.2 Solicitation and Selection of Proposals

4.2.1 Eligible Research Proposals

- (1) Research proposals are solicited for the research area mentioned in the section, “1.2 Research Areas for which Research Proposals are Solicited” in Chapter 1.
- (2) Carefully read the “Overview” and “Research Supervisor’s Policy on Calls for Proposals, Selection and Management of the Research Area” mentioned in “Chapter 6 Research Areas for which Proposals will be Solicited” for individual Research Area before proposing research appropriate for one of the research areas.
- (3) Be certain to confirm important common items described in “Error! The source of reference is not found.”

4.2.2 Solicitation Period

Wednesday, April 12 to 12:00 (Noon) on Tuesday, May 30, 2017 (No exceptions).

For information on schedules for briefings, calls for proposals, etc., please refer to “1.3 Solicitation and Selection Schedule.”

No proposal for which the application procedure has not been completed via e-Rad by the deadline is subject to examination for any reason.

4.2.3 Numbers of Research Projects

This solicitation round is projected to select a maximum of 30 projects.

Note: The number of proposals selection may vary depending upon budgetary and other factors.

4.2.4 Proposal Submission Requirements

Requirements for those submitting proposals are discussed below.

Please make sure that you understand these requirements for your submission.

Note: In principle, if the determination has been made that a submission does not meet the requirements by the time of selection, the research proposal will either not be accepted or selected.

Note: Once a research proposal has been selected, the Research Project shall maintain its qualified status per the submission requirements for the entire duration of the period of research. If the Research Project fails to

meet the requirements during the research period, the Research Project will in principle be completely or partially suspended (i.e. be terminated early).

When submitting a proposal, please do so based on an understanding of the points below and “Chapter 8 Key Points in Submitting Proposals” and “Chapter 9 Limitations on the Overlap of Proposals within the Strategic Basic Research Programs.”

(1) Requirements for Research Project Applicants

- a. A research project applicant must be the person himself/herself who is going to be the Individual Researcher.
- b. Applicants are required to be less than 35 years’ old as of April 1, 2017. Students, too, may apply if they are in graduate programs.
- c. The applicant must write his/her research proposal as a person who suggested the idea and undertake such research independently, to bring the idea into reality. The ACT-I program is open to researchers with corporations and other entities, so long as they are deemed fully capable of conducting individual research in accordance with the ACT-I policy.
- d. Applications by students in master’s and doctorate programs will require submission via e-Rad, of a memorandum of confirmation on requirements co-signed by the applicant and the academic supervisor. More specifically, in this memorandum, academic supervisors will be held responsible for the following items:
 - The applying student’s academic institution is capable of entering into a contract research agreement with JST as described in the Application Guidelines.
 - The student applicant will, as “research practitioner” in the contract research agreement, be the main person to conduct contract research.
 - The applying student’s academic supervisor will, as “research monitor” in the contract research agreement, supervise the project and be held responsible for its terms and conditions.
 - The student applicant’s academic institution will agree to the necessity of an agreement between the institution and the student governing intellectual property that will likely emerge as products of the research project.

The memorandum of confirmation form may be downloaded from the page below. The student applicant and his/her academic supervisor are both required to sign the document and upload it via e-Rad:

http://senryaku.jst.go.jp/teian/en/koubo/act-i_confirm_en.pdf

For the ACT-I contract research agreement form, please go to the following page:

<http://www.jst.go.jp/kisoken/contract/h29/h29s201keiya170401.pdf>

*In the 2017 fiscal year, restriction was relaxed for special researcher-DC to receive a research grant aside from the incentive for special researchers. Read the page below to confirm the purpose of relaxing the restriction.

https://www.jsps.go.jp/j-pd/pd_keiji.html#170126

e. Research project applicants must hold Japanese citizenship or be a foreign researcher who will pursue research work within Japan.

- Researchers holding Japanese citizenship:

For proposals to perform research work at an overseas research institution, it must be possible for the subject research institution to enter into a research agreement with JST, and, when JST specifies expenditure guidelines, it must be possible to properly undertake expenditures in accordance with the specified expenditure guidelines. For more details, please refer to the next item (3) and the Q&A section at the end of this volume.

- Foreign researchers who will pursue research work within Japan:

Once selected, it will be necessary to perform the proposed research work at a domestic Japanese research institution and it must be possible to perform the proposed research work at a domestic Japanese research institution until the end of ACT-I research. It will also be required that administrative tasks be handled in the Japanese language (or that the researcher's working environment allow for this.)

Note: Japanese researchers who will perform research work at an overseas research institution and foreign researchers who will perform research work at a domestic Japanese research institution needs to pay attention to the items below;

- Japanese researchers who will perform research work at an overseas research institution and foreign researchers who will perform research work at a domestic Japanese research institution needs to pay attention to the items below;
- Depending on the legal status of the Individual Researcher, ACT-I research may be subject to the export restrictions in the Foreign Exchange and Foreign Trade Law. In such instances, JST may choose not to select his/her proposal or take steps to cancel the project.

f. The researcher must take responsibility for his/her ACT-I research project throughout the entire research term and be capable of overseeing it to its completion.

Note: For more details, please refer to "5.2.5 Responsibilities of Individual Researchers."

g. The applicant must either: Have already completed the educational program for research integrity at his/her affiliated research institution; or complete the JST-provided educational program by the application deadline.

Note: For more details, please refer to "8.1 Enrolling in and Completing the Educational Program for Research Integrity."

h. The applicant must pledge following four items upon submission.

- Understand and comply with "Guidelines for Responding to Misconduct in Research Activities" (decided by the Minister of Education, Culture, Sports, Science and Technology on August 26, 2014).
- Understand and comply with "Guidelines on Management and Audit of the Public Research Expenses in Research Institutions (Implementation standards)" (decided by the Minister of Education, Culture, Sports, Science and Technology on February 15, 2007; revised February 18, 2014).
- If the research proposal is accepted, the Individual Researcher must not engage in misconduct in their research (fabrication, manipulation, and plagiarism) nor in inappropriate usage of research funds.

- The research project applicant must not have engaged in misconduct in the past to achieve the research results that are mentioned in the submitted research proposal.

Note: The above verification will be part of the e-Rad Submission Information Entry screen.

(2) Requirements for Research Institutions Conducting ACT-I Research

- a. Research institutions conducting ACT-I research (research institutes with which the selected Individual Researchers are affiliated or the research institutes with which full-time JST researchers are affiliated) must fully recognize that the research funds are public funding, ensure compliance with related law, and make efforts to implement the research effectively upon implementation. Research institutes that cannot accomplish the tasks described in “5.2.6 Responsibilities of Research Institutions” will not be enjoined to implement research; thus, when applying, the prior consent of the research institute at which the implementation of research is planned shall definitively be obtained.

(3) Requirements for Performing Research Work at an Overseas Research Institution

- a. Approval of the Research Supervisor (Form 7)

In the case that research is carried out at an overseas research institution etc. an approval of the Research Supervisor will be required regarding the items listed below. Those wishing to conduct the research overseas must complete Form 7 “Other Special Remarks” in the research proposal, stating the reasons why they wish to carry out their research overseas. In the case that approval of the Research Supervisor cannot be obtained measures will be taken including the non-adoption of the research proposal and the cancellation of the research project etc.

1. The necessity in realizing the research concept of the researchers
2. The necessity of working at the overseas research institution in question

- b. The research contract forms stipulated by JST

In principal, research institutes shall conclude research contracts with content proposed by JST. (Indirect costs are up to 30% of direct costs.) Please refer to “5.2.6 Responsibilities of Research Institutions (2) For Overseas Institutions” for the detail of conclusion of research agreement.

4.3 Research Proposal (Form) Completion Requirements

A list of documents to submit is shown below. Prepare research proposals by following the research proposal completion requirements described on the following pages.

Please use the Research Proposal Form of FY2017. Please download the Research Proposal Form from e-Rad and follow instructions in “Research Supervisor’s Policy on Call for Application, Selection, and Management of the Research Area” when you produce the proposal.

Form No.	Document
1	Research Proposal
2	Project Description
3	Explanation of Keywords
4	Lists of principal research papers, invited lectures and patents
5	Information on Other Supports
6	Protection of Human Rights and Compliance with Laws and Regulations
7	Other Special Remarks

Note: File sizes should not exceed 3MB in total.

Note: In addition to the above documentation, applications by students require a memorandum of confirmation, as per the following template, co-signed by the applicant and his/her academic supervisor and uploaded via e-Rad.

Memorandum of Confirmation Form: http://senryaku.jst.go.jp/teian/en/koubo/act-i_confirm_en.pdf

Note: Please read “5.1.1 Conflicts of Interest involving Research Project Applicants and the Research Supervisor” or the (ACT-I - Attachment) Proposal Preparation Checklist “Conflict of interests with the Research Supervisor.” If there is even one item for which a judgment cannot be made, download and fill the Inquiry Form below and send it to the Contact before submitting a research proposal.

Inquiry Form: http://senryaku.jst.go.jp/teian/en/koubo/H29youkou_form-en.doc

Contact: rp-info@jst.go.jp

Note: For more information on how to submit a research proposal, please refer to “Chapter 10 Recruiting via the Cross-ministerial R&D Management System (e-Rad).”

Note: Prior to submitting your research proposal, please confirm understanding of “Chapter 8 Key Points in Submitting Proposals” and “Chapter 9 Limitations on the Overlap of Proposals within the Strategic Basic Research Programs”.

Proposal Preparation Checklist

○ **Please give yourself plenty of time to go complete this checklist.**

	Check	Reference Material	
	Have you completed e-Rad researcher registration?	Chapter 10	<input type="checkbox"/>
	Have you completed the educational program for research integrity?	Section 8.1	<input type="checkbox"/>
	Conflict of interests with the Research Supervisor*	Section 5.1.1	
a	The research project applicant is a relative of the Research Supervisor.		No <input type="checkbox"/>
b	The research project applicant and the Research Supervisor are both affiliated with the same smallest organizational unit (e.g. same research lab) of a university, national or an other national government-funded research and experiment institution. Or, the research project applicant and the Research Supervisor are affiliated with the same company.		No <input type="checkbox"/>
c	The research project applicant and the Research Supervisor are presently working in close cooperation on the same joint research project. Or, have done so within the past five years (Existence of close cooperation will be judged by the facts that, for example, the research project applicant and the Research Supervisor are working together on the same research project, are performing different parts of the same research project, or are co-authors of a research paper).		No <input type="checkbox"/>
d	The research project applicant and the Research Supervisor were in a close teacher-student relationship for a total of more than ten years (not necessarily continuous), or were in a direct employer-employee relationship. “Close teacher-student relationship” means cases in which the research project applicant and the Research Supervisor were affiliated with the same research lab, and cases in which the Research Supervisor, though affiliated with a different lab, essentially functioned as a research advisor for the research project applicant		No <input type="checkbox"/>

* When it is unclear whether any of the above conditions apply, please download and fill the Inquiry Form (https://securekisooken.jst.go.jp/H29youkou_form.doc) and send it via email to rp-info@jst.go.jp.

- **Submission deadline**
Just before the deadline, the e-Rad System would be slow due to heavy load. Please give yourself plenty of time to complete submission.
- **Research Proposal Form**
Prior to electronic submission via e-Rad, please ensure that proposals comply with the instructions in the format specified. If these instructions are not followed, the research proposal might not be accepted.

	Items	Check point	
/	Input of general information on the applicant to e-Rad	All necessary information is provided.	<input type="checkbox"/>
Form 1	Research Proposal	All necessary information is provided. Information is matched with e-Rad data.	<input type="checkbox"/>
Form 2	Project Description	When converted to PDF format, Form 2 is no more than three pages long.	<input type="checkbox"/>
Form 3	Explanation of Keywords	When converted to PDF format, Form 3 is within one page.	<input type="checkbox"/>
Form 4	Lists of principal research papers, invited lectures and patents	When converted to PDF format, Form 4 is no more than two pages long.	<input type="checkbox"/>
Form 5	Information on Other Support	All necessary information is provided.	<input type="checkbox"/>
Form 6	Protection of Human Rights and Compliance	Even when this is not applicable, please indicate that.	<input type="checkbox"/>

	with Laws and Regulations		
Form 7	Other Special Remarks		<input type="checkbox"/>
Memorandum of Confirmation	Memorandum of Confirmation (required only when the applicant is a student)	The applicant and his/her academic supervisor have agreed to the terms of the memorandum, co-signed the document, and converted it into PDF.	<input type="checkbox"/>

Instruction for research proposal preparation

区分 4

(ACT-I-Form 1)

FY2017 Application ACT-I Research Proposal

Title of proposed research project	
Name of the Individual Researcher	
Date of birth	Year Month Day
Affiliated Institution, Section, Title	<i>If you are a student-applicant, please state your year in the master's or doctoral program, and the name of your department and graduate school.</i>
Researcher ID No.	<i>Enter the 8-digit "e-Rad" login ID which is provided by registering researcher information on the e-Rad system (http://www.e-rad.go.jp).</i>
Academic Background	<i>List the applicant's undergraduate and graduate education as indicated below: Year: Undergraduate Institution, Major Degree, Supervisor Year: Graduate Institution, Major Degree, Supervisor</i>
Professional Appointments	<i>List, in chronological order, all academic/professional appointments of the applicant finishing with the current appointment. Include the name of a project leader or a supervisor who had/has been at a mentoring position for the given appointment.</i>
Information of Individual Researcher	<i>URL: Please indicate URL if there are any websites where the information of the Individual Researcher is available (such as a web page of his/her laboratory or researchmap webpage, etc.)</i>
Research Budget	Total Budget: _____million yen (Do not include indirect cost) <i>Note: The standard budgetary provision is 3 million yen. You may request a larger budget (up to about 5 million yen), in which case you are required to state the reasons in your project description</i>
Affiliate Appointment	<input type="checkbox"/> Affiliated with the institution expected to undertake contract research <input type="checkbox"/> Exclusive Appointment <input type="checkbox"/> Student <i>Note: Check whether it agrees with the input in e-Rad.</i>
Effort of this FY	_____%
Place to Pursue Research Work	<input type="checkbox"/> Present Affiliated Institution <input type="checkbox"/> Other (Place to Pursue Research Work: _____)

- **Proposed Research Area**
Only one application may be submitted across all the Research Areas in ACT-I, PRESTO and CREST.
- **Title**
Correctly enter titles, such as Specially Appointed Associate Professor, Tenure-Track Assistant Professor, etc.
- **Researcher ID No.**
Proposals must be submitted via the e-Rad system. Those who do not have Kakenhi ID or e-Rad login ID should contact their affiliated Research Institution personnel or the e-Rad Helpdesk immediately to obtain the e-Rad ID. See Section 8.3.1 in this guideline.
- **Affiliate Appointment**
Please check either “Affiliated with the institution expected to undertake contract research,” “Exclusive Appointment,” or “Student” based on the following definitions.
 - *For non-student applicants*
 - *Affiliated with the institution expected to undertake contract research: You intend to participate in ACT-I research while being affiliated with a research institution or a corporation at the time of proposal selection.*
 - *Exclusive Appointment: You participate in ACT-I research through JST employment because, at the time of proposal selection, you will be unaffiliated with any research institution or corporation or leaving your position by the employer’s decision.*
 - *For student applicants*
 - *Student: Students who will be in master’s or doctoral programs at the time of proposal selection (Student-applicants will not be considered for JST employment as exclusive appointment researchers).*
- **Efforts in this fiscal year**
Describe the distribution ratio (%) of time necessary to undertake the research, assuming that a total work time (research-, educational-, and medical-related) for the year is 100%, as defined by the General Science and Technology Innovation Conference. Do not include efforts, such as those of grants, that are being applied or planned. Include only efforts, such as grants that are being received or to be received in case the proposal is adopted only for ACT-I. The sum of the ratio of efforts in ACT-I and the grant presently received must not exceed 100%.
- **Place to Pursue Research Work**
Please check the place where you plan to pursue research. Applicant who choose “Other” shall be asked when the proposal is selected. JST also accepts consultation prior to submission.

Please delete this page at the time of suggestion

(ACT-I-Form 2)

Project Description

- Please describe as clearly as possible for a wide range of expert evaluators. Figures and tables (in color) may be included if necessary.
- Do not exceed three A4-size sheets (no exceptions). Use 10.5 point or larger font size (If these instructions are not followed, the research proposal might not be accepted).
- Please delete italicized instructions and other notes from the research proposal forms.

1. Outline of the Research Proposal

Please outline your Research Proposal within 250 words.

2. Purpose and background

Please state the R&D purposes of your Proposal and provide any background to your conceptions, including connections with your R&D work to date. If necessary, please refer to paper numbers in your List of Research Accomplishments.

3. R&D description

Please state your Research Proposal's goals (to be attained within 18 months upon the completion of ACT-I) and a list of specific R&D items required; and explain how challenging this proposed Project is (the general difficulty of the goals but also exactly how you intend to overcome the challenge) in ways that would be intelligible to a wide range of researchers as well as to peers in your own field, so they may provide a fair assessment of the compelling nature of your Proposal.

If the research (direct) budgets costs are expected to exceed 3 million yen, please state your reasons succinctly. (The maximum budget allowed is approximately 5 million yen.)

4. Originality and innovativeness of the proposal and comparison with similar research

Please provide R&D trends in related fields in Japan and abroad and position against this background the originality and innovativeness of your proposed research.

5. Future vision

Please describe what new values you intend to generate through your proposed research and what sort of future you intend to explore.

Do not exceed three A4-size sheets (no exceptions)

(ACT-I-Form 3)

Explanation of Keywords

- *Please provide a glossary of terms that will enable evaluators from a wide range of expertise to understand your research proposal. Figures and tables (in color) may be included if necessary.*
- *Do not exceed one A4-size sheet (no exceptions) (If these instructions are not followed, the research proposal might not be accepted).*
- *In explanation of your keywords, you may feel free to control font size (unlike in the Project Description).*

Do not exceed one A4-size sheet (no exceptions)

(ACT-I-Form 4)

Lists of principal research papers, invited lectures and patents

- Please provide a list of your research accomplishments, strictly within no more than two pages of A4 paper, including principal research papers and invited lectures. (Applicants who fail to abide by this requirement may have their proposals rejected.)
- Please feel free to control font size or line spacing for better legibility.

1. List of Research Papers

- As for accomplishments in peer-reviewed journals and international conference proceedings, please specify the respective numbers of research papers of which the applicant is the principal author and those of which s/he isn't.
- In addition to the total number of your publications, please list your principal research papers in reverse chronological order. Please put a number at the beginning of each line, from (1) through (5); you may cite these research paper numbers for reference in your research plan description.
- Please include the following elements in your list of principal research papers.
Authors (name all authors and underline the applicant), research papers title, journal title (for international conference proceedings, name the conferences), volume, pages, year of publication

(1) Peer-reviewed journals

Total number of research papers by the applicant as lead author: _____
Of these, list principal research papers

(2) Peer-reviewed journals

Total number of articles by the applicant NOT as principal author: _____
Of these, list principal research papers

(3) Peer-reviewed proceedings of international conferences

Total number of research papers by the applicant as principal author: _____
Of these, list principal research papers

(4) Peer-reviewed proceedings of international conferences

Total number of articles by the applicant NOT as lead author: _____
Of these, list principal research papers

(5) Total number of other research papers and oral presentations: _____

Of these, list principal research papers and oral presentations

2. List of Invited Lectures

- Please state the total number of the applicant's invited lectures.
- Of these invited lectures, please identify and describe in detail principal invited lectures.
- Please number the lines.

Total number of invited lectures: _____

Of these, list principal invited lectures

3. List of awards

- Please provide the total number of awards the applicant has won.
- Of these, please describe major awards specifically, if any.

Total number of awards: _____

Of these, list major awards

4. List of Patents

- Please provide the total number of patents, the inventors of which include the applicant.
- Of these, please describe major patents specifically, if any.
- Please number each line and provide the following items. Please feel free to order the list in any sequence.
Patent application number; inventors (underline the applicant), name of invention, patent applicant, date of application

Total number of patent applications: _____ Total number of patents granted: _____

Of these, list major patents

5. Appealing him/herself

- A self-appeal, such as a variety of performance and development ability and skills of other than the above, please describe in as much detail as possible with specific examples. This column cannot be omitted.
- A repeated explanation in this column is acceptable, if there are points to be appealed among descriptions in items 1.-4. above. If descriptions are limited in the above items, concrete descriptions in this column will be even more important.
- If descriptions are limited in items 1.-4. above, concrete descriptions in this column will be even more important.
- A repeated explanation in this column is acceptable, if there are points to be appealed among descriptions in items 1.-4. above.

Do not exceed two A4-size sheets (no exceptions)

Information on Other Supports

List grants from the government competitive research funds (including CREST and PRESTO) and any other research subsidies (including private foundations and overseas institutions) that the applicant is currently receiving by program name, indicating the title of project, research period, roles, amount of annual budget, and effort. Refer also to Section 8.3, "Measures against Unreasonable Duplication and Excessive Concentration."

(Note)

-Your entitlement to the JST funds may be cancelled at a later date even if you have been selected should your presentation fail to be accurate.

-If the results of applications for research grants become known, or if there are other changes in circumstances during the research proposal selection process, requiring the information provided in this form be updated, please prepare a revised version of this form and send it with explanations to the email address provided at the end of these requirements.

-Should you be selected for participation in the interview selection process, you may be asked to provide information on applications, plans, etc. submitted to other programs.

(Example)

Name of Funding	Recipient Status	Research Project Title (Principal Investigator's Name)	Research Period	Role (Principal Investigator or co-Principal Investigator)	(1) Allocated Budget (For entire period) (2) FY2017 (planned) (3) FY2016	Effort (%)	
ACT-I	Submitted	/					
Grants-in-Aid for Scientific Research, Fundamental research (C)	Awarded	XXXXXXXX (XXX)	2015.4 — 2018.3	PI	(1) (2) (3)		

- Please list from the highest amount of research funding received by the Research Proposal Applicant (for entire period) to present funding received or already earmarked. Please also list any research funding which you are receiving or for which you are planning to and describe their status in the Recipient Status column.

- For "Role" section, write "Principal Investigator" or "co-Principal Investigator," etc.

- For "Allocated Budget" section, write the amount that the Research Proposal Applicant themselves receives (direct cost).

- "Effort" is based on the Council of Science and Technology Policy's definition of "effort": "the percentage of working hours required for conducting the relevant research when the researcher's total annual working hours are 100%." Note that "total working hours" refers not only to the number of hours spent in research activities but also to overall substantial working hours, including educational and medical activities. Student-applicants are required to project how much (%) of 40 hours per week will be allocated to ACT-I activities. Do not include in "efforts" time spent for funding in the state of "having applied" or "planning to apply," but indicate only "efforts" for funding presently received, assuming that you have been selected for only ACT-I. Be careful not to exceed 100 % for the total of "efforts" for ACT-I and the funding presently received.

- Add rows if needed.

(ACT-I-Form 6)

Protection of Human Rights and Compliance with Laws and Regulations

Describe the measures and actions that you will take if your research involves compliance with the related laws and regulations (e.g. research requiring the consent and the cooperation of the other party when implementing the research plan, research requiring consideration for the handling of personal information and research requiring efforts regarding bioethics and safety measures).

This applies to surveys, research, experiments which require an approval procedure in an ethics committee inside and outside the research institution, such as for example questionnaire surveys in which personal information is involved, interview surveys, the use of provided samples, analysis study of the human genome, recombinant DNA experiments, experiments on animals, etc.

Please indicate where this is not applicable.

Other Special Remarks

○ **Other Special Remarks**

- *If a research issue described in the section titled “Presence of Subsidies in Other Institutions” in Form 5 gives an impression that the issue is closely related to an ACT-I application, provide a concrete explanation in this item on the differences between the issue and proposed research in ACT-I. If the titles resemble, it is important to describe the differences clearly.*
- *Applicants who wish to conduct research outside Japan are required to state the reasons here, as per “4.2.4 Proposal Submission Requirements” in the Application Guidelines.*
- *Other than stated above, state the reason(s) why you have applied for ACT-I, any requests concerning your research, scheduled or planned changes in your professional position, or any concerns that you might have.*

4.4 Guidelines for filling in information for intended interviewees

We request that you prepare documents (for screening interviews and supplementary explanation materials) after you have been selected for interviews. We will inform those who have been selected for interviews to prepare the documents and inform them of the submission deadline.

Once you are notified, please prepare the documents based on the “Guidelines for Filling-in Information for Intended Interviewees” described in the following pages.

Screening Interviews and Supplementary Explanation Materials
1. Place to Pursue Research Work
2. Affiliate Appointment
3. Informal consent from the personnel division and/or contract division of your institution of affiliation regarding your intent to submit a research project proposal
4. Informal consent from your superior about your intent to submit a research project proposal
5. Research Cost Plan for the Total Research Period
6. Place to Pursue Research Work
7. Outline of Research Proposal
8. Other Concerns
9. Information on Other Supports
Checklist

ACT-I (Advanced Information and Communication Technology for Innovation)
Screening Interviews and Supplementary Explanation Materials for FY 2017 (Example)

Note: Yellow cells indicate mandatory input.

Name of Research Proposal Applicant	Present Affiliation, Section, Title			Research Project ID
○○ ○○	○○ University	Department of ○○	Graduate School of ○○	00000000
Research Project Title	○○○○○○○			

It is necessary to fill in the items in Japanese as well, even if the proposal is written in English.

1. [If you are to change the location of your research work from your location at present]

Place to Pursue Research Work:

2. Affiliate Appointment:

Please write “Student,” “Exclusive appointment,” or “Affiliated with the institution expected to undertake contract research,” based on the following:

Students upon ACT-I selection

(1) Students who will be in master’s or doctoral programs at the time of proposal selection (Student-applicants will not be considered for JST employment as exclusive appointment researchers).

NOT students upon ACT-I selection

(2) Exclusive Appointment: You participate in ACT-I research through JST employment because, at the time of proposal selection, you will be unaffiliated with any research institution or corporation or leaving your position by the employer’s decision.

(3) Affiliated with the institution expected to undertake contract research: You intend to participate in ACT-I research while being affiliated with a research institution or a corporation at the time of proposal selection.

3. Have you obtained informal consent from the personnel division and/or contract division of your institution of affiliation regarding your intent to submit a research project proposal?

[In the case of exclusive appointments] Have you engaged in consultation regarding the affiliate appointment?

[In the event that research work is to be pursued at a company]

Have you engaged in consultation regarding the affiliate appointment, effort, activity, research environment, etc. with relevant divisions (such as the division you belong to, the personnel division, etc.)?

4. Have you obtained informal consent from your superior about your intent to submit a research project proposal?

5. Research Cost Plan for the Total Research Period

(1) Budget Plan for the Total Period

Item	Initial Year (Oct. 2017 – Mar. 2018)	2 nd Year (Apr. 2018 – Mar. 2019)	Total (in units of 1,000 yen)
Commodities			
Travel Expenses			
Personnel Expenses (including Research Assistant Fees)			
Other Expenses			
Total			

(2) Regarding research equipment and apparatuses

Please actively consider sharing research equipment and apparatuses, etc., at your institution of affiliation based on “Research Equipment and Apparatus Sharing Systems for Research Organization Units” (hereinafter referred to as “apparatus sharing systems”), which was proposed to be put in effect by the Fundamental Committee of Leading-Edge Research of the Council for Science and Technology in its November 2015 guideline, “Introduction of New Research Equipment and Apparatuses Operating Integrally with Research Organization Management.” In particular, highly versatile large-scale research equipment and apparatuses at universities and national research organizations will be considered to be treated as an “apparatus sharing systems” at your research organization.

Therefore, please make sure of the following:

- i) The research project applicant shall confirm that the following research apparatus do not overlap with apparatus sharing systems at their research organization of affiliation (faculty, major, research laboratory, center, etc.).
- ii) Before starting research (concluding contract research agreements), regarding the purchasing plan described under item (b) below, related to the research project applicant, it will be necessary to have prior confirmation in writing from the person in charge of the apparatus sharing systems regarding validity from the viewpoint of sharing equipment and apparatuses at each affiliation. If the “apparatus sharing systems” is not introduced, prior confirmation in writing will be necessary from the JST person in charge of contract research agreements. Please be aware of this beforehand.

<input type="checkbox"/> Confirmed Regarding i) <input type="checkbox"/> Acknowledged Regarding ii) * Please check the box to indicate approval

Note: If you belong to an organization that has not introduced the “apparatus sharing systems,” contact the division in charge of research strategy or facilities in the administrative headquarters of university research organizations and introduce the “apparatus sharing systems.” Please refer to notes in Chapter 4, Section 3.10 (1).

- List of major equipment/apparatuses (costing more than 2 million yen per item) that needs to be newly purchased

Name of Equipment/Apparatuses	Estimated Cost (in units of 1 million yen)	Purchasing Period (eg., Oct. 2017)

- Equipment/apparatuses already used and available for continuing future use

Name of Equipment/Apparatuses		Remarks

(3) Number of research assistants to be employed

Note: Research Assistants are those who do supplementary work on ACT-I projects such as by collecting and organizing research data, taking care of experiment animals and plants, cleaning laboratory ware, etc.

Note: You cannot hire researchers or technicians/engineers.

Note: You cannot hire secretarial assistants.

(4) If any other major costs should occur, please write the contents.

6. Place to Pursue Research Work

(1) If you need to organize a new space besides the present research laboratory, clearly indicate so.

(2) [In the event that you request research work to be pursued overseas (exceptional measure)]

State the reason why it must be done overseas.

--

7. Outline of Research Proposal

Describe the outline of the research proposal in simple language (within 125 words). When selected, it will be used as reference material for press releases.

8. Other Concerns

If you have any concerns regarding the questions above or the time of selection, please mention so here.
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9. Information on Other Supports

(1) Efforts towards Research Proposals for ACT-I,

(2) Information on Other Supports

- Regarding any government competitive funding or other research grants that the research proposal applicant is presently receiving, has applied for, or is planning to apply for, the research project title, the research cost, the research period, and their role (Principal Investigator or co-Principal Investigator, etc.) should be clearly stated below for each fund. If the contents are found to be false, there may be cases where acceptance may be cancelled at a later date.
- Due to selection results being announced, if there will be any changes to the contents of the research proposal already submitted, please note them.

Name of Funding ¹⁾	Recipient Status ²⁾	Research Project Title (Principal Investigator's Name)	Research Cost (in units of 1,000 yen) ³⁾ (1) For FY2017 (2) For FY2018 (3) For Entire Period	Research Period (eg., Apr. 2015 – Mar. 2018)	Role ⁴⁾	Effort (%) ⁵⁾
		(○○○○○)	(1) (2) (3)			
(Target, Research Subject, Experimental Method, etc., Difference from ACT-I Proposal, Relevance)						
		(○○○○○)	(1) (2) (3)			
(Target, Research Subject, Experimental Method, etc., Difference from ACT-I Proposal, Relevance)						
		(○○○○○)	(1) (2) (3)			
(Target, Research Subject, Experimental Method, etc., Difference from ACT-I Proposal, Relevance)						
		(○○○○○)	(1) (2) (3)			
(Target, Research Subject, Experimental Method, etc., Difference from ACT-I Proposal, Relevance)						
		(○○○○○)	(1) (2) (3)			
(Target, Research Subject, Experimental Method, etc., Difference from ACT-I Proposal, Relevance)						

	Received	FY2017 FY2018 Entire Period	(1) (2) (3)
	Applied	FY2017 FY2018 Entire Period	(1) (2) (3)

Total efforts including ACT-I

Notes on documentation

1) Name of Funding

Please list from the highest amount of research funding received by the Research Proposal Applicant (for entire period) to present funding received or already earmarked.

2) Recipient Status

Write "Received" if you are presently receiving funding or funding is earmarked. If you have already applied or are applying, write "Applied."

3) Research Cost (in units of 1,000 yen)

Write the amount that the Research Proposal Applicant receives (direct cost).

4) Role

Write "Principal Investigator" or "co-Principal Investigator," etc.

5) Effort

This is based on the Council of Science and Technology Policy's definition of "effort": "the percentage of working hours required for conducting the relevant research when the researcher's total annual working hours are 100%." Note that "total working hours" refers not only to the number of hours spent in research activities but also to overall substantial working hours, including educational and medical activities. Student-applicants are required to project how much (%) of 40 hours per week will be allocated to ACT-I activities.

Do not include in "efforts" time spent for funding in the state of "having applied" or "planning to apply," but indicate only "efforts" for funding presently received, assuming that you have been selected for only ACT-I. Be careful not to exceed 100 % for the total of "efforts" for ACT-I and the funding presently received.

However, if you spend effort on projects you are partially involved even though you do not receive any monetary compensation, please indicate this.

Checklist

Please answer the following items freely or answer YES/NO and describe in detail.

1. In the case of exclusive appointments

1) Reason and necessity in regard to why you will conduct the ACT-I project under an exclusive appointment.

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2) Have you notified your research affiliation of your plan to implement the ACT-I project as an exclusive researcher and received consent?

Yes/No	(Describe in detail)
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3) Regarding the affiliate appointment in the ACT-I project, have you consulted with the receiving organization?

What type of affiliate appointment are you intending?

Yes/No	(Describe in detail)
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4) Are there any plans for personnel transfers during the ACT-I project period?

(Describe in detail)

2. In the event you are requesting to perform research work at an overseas research institution

1) Do you have adequate approval from the relevant manager(s) of your research institute for your plans to conduct ACT-I research at the institute in the affiliation appointment you desire?

Received consent: YES/NO	If YES, please write the name of the division and the name of the person in charge If NO, please write the reason and prospects for when you expect to get approval.
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2) If and when applicants desire conducting ACT-I research outside Japan, JST will require that the institution of the applicant's affiliation satisfy all the application requirements. (If this is unacceptable, there will not be any agreement with JST). Please review the following requirements and take appropriate steps to provide the subject overseas research institutions with prior briefing or obtain prior approval.

Items to be checked before signing	Application Guidelines	Research Agreement Form	
In principle, a contract research agreement shall be concluded in the JST-designated documentation.	5.2.6(2)a	All articles (including the Appendix)	Agree <input type="checkbox"/>
The subject overseas research institutions shall transfer intellectual property rights resulting from research to JST without compensation (Article 19 of the Industrial Technology Enhancement Act, the Japanese version of the Bayh-Dole Act, will not apply to overseas organizations).	5.2.6 (2)c	Article 9.1	Agree <input type="checkbox"/>
Payments in indirect costs to the subject overseas research institute shall not exceed 30% of research (direct) costs.	5.2.6 (2)a	Article 5.3	Agree <input type="checkbox"/>
The subject overseas research institution is capable of managing cost expenditure appropriately and in full compliance with the JST guidelines.	5.2.6 (2)b	Articles 4 – 6, APPENDIX 5	Agree <input type="checkbox"/>
The subject overseas research institution is capable of producing and submitting to JST expense breakdowns and other details in English.	5.2.6 (2)b	Article 6.2.1, APPENDIX	Agree <input type="checkbox"/>
Report to JST swiftly (within 10 workdays) when an invention qualified for intellectual property right is achieved.	5.2.6 (2)c	Articles 9.2, APPENDIX6	Agree <input type="checkbox"/>

3) Is the relevant manager (or supervisor) of the receiving institution in agreement with the terms and conditions (as per the provisions of the Application Guideline) and the template of a collaborative research agreement with JST?

Received consent: YES/NO	If YES, please write the name of the division and the of the person in charge If NO, please write the reason and prospects for when you expect to get approval.
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4) Can you obtain resident status during the ACT-I project period and do you have that prospect?

	(e.g., you presently have resident status for xxxxxxxxxx, and have prospects to obtain yyyyyyyy status. If accepted, continued research at the institution is possible without difficulty.)
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5) Do you have any plan or intentions to transfer to other affiliations during the ACT-I project period?

	(Describe in detail: Name of institution or country, region of transfer)
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3. In the event you desire to pursue the research project at a private enterprise

1) Have you notified the private enterprise of your intention to pursue the ACT-I research project there and received consent? Do you have prospects to secure efforts, activity contents, and research environment?

	(Clearly specify how you intend to secure these.)
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2) Regarding the affiliate appointment in the ACT-I project, have you consulted with the receiving organization?

What type of affiliate appointment are you intending?

	(Describe in detail)
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3) Do you have plans to transfer elsewhere or retire during the ACT-I project period?

	(Describe in detail)
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4. If you have foreign nationality

1) When selected, will you be conducting research in a research institution in Japan and can you continue to research in Japan until the end of the ACT-I research project period?

	(Name of research institution and post)
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2) Is the researcher themselves able to handle administrative procedures in Japanese?

	If NO, Please answer 3).
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3) Do you have close access to a Japanese-language environment for administrative documentation?

	(Describe in detail)
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5. For student-applicants

1) Have you reported to your academic supervisor of your plans to undertake ACT-I research and obtained his/her approval for it?

(Research proposals by student-applicants must be accompanied by a memorandum of confirmation co-signed by the applicant and the academic supervisor through e-Rad submission.)

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2) Is the legal (or relevant) department of the applicant's institution of affiliation in agreement on entering into a contract research agreement, as per the Application Guideline, with JST? Also, in accordance with the provisions of the contract research agreement, are any relevant departments of the institution of the applicant's affiliation in full agreement with the necessity of legal arrangement about any intellectual property arising from research results?

	(Please describe in detail.)
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3) Do you have any plans for employment during the ACT-I research duration (by March 2019) or any job offers to that effect?

Yes/No

For student-applicants seeking employment.

State whether you intend to continue with ACT-I research upon your employment.

Note: For student applicants to continue with ACT-I research after graduation and through employment, it is necessary for their employers to allow them to do so and also to enter into a contract research agreement with JST.

(Describe in detail)