1. What is the “Freshman Course (FC)”?

The Freshman Course (FC) is an online course, specially designed for newly-enrolled students of SOKENDAI. This course has two objectives: (1) To acquire basic knowledge and skills required for all researchers; and, (2) To understand the SOKENDAI’s broad range of intellectual fields, and create a network beyond your research field. The course consists of three main sessions: “Exploring Diversity in Academia (EDA),” “Researchers and Society,” and “Communicating Skills for Researchers.” For the class details, please check the FC website (https://freshman.soken.ac.jp).

| Exploring Diversity in Academia (EDA) | At SOKENDAI and the research institutes, research is conducted through a variety of methods, taking the advantage of the abundant research materials and facilities. Research methods and subjects do expand and deepen as research progresses, and that often promotes the interdisciplinary research and achievement. Your research may also develop into an unexpected collaborative research and open up a new field. “Exploring Diversity in Academia” consists of presentations by current students (FC Student Coordinators) and a panel discussion by professors, that helps you learn about a wide range of as well as common areas of research activities in SOKENDAI, envision your research career, and build a new network with other students and professors coming from various research fields and backgrounds. |
| Researchers and Society | In today's society, researchers are required to have a high level of expertise and to be responsive to society. In particular, research misconduct has become a major social issue in recent years, and the need for researchers to be aware of appropriate ethical standards has increased. In this session, we will not only teach the ethical norms that researchers should follow, but also deepen the understanding of the relationship between research and society, which is the background of the ethical norms, and aim to cultivate the ability to understand the ethical norms necessary for researchers to play a desirable role in society and for the healthy functioning of the research community. To this end, we have developed the "Researcher and the Community of Researchers". For this purpose, workshops and lectures will be held based on representative topics related to “Researchers and Society.” |
Communicating Skills for Researchers

One of the most important actions for researchers is to communicate their opinions to others in a clear and effective manner. This is one of the most important acts for researchers. There are two main ways of communicating opinions: writing and speaking (presentation). These are skills that can be greatly improved by learning them. In this course, students will first understand the structure of writing, and then learn the basics of "writing" through practical exercises to read and improve written materials objectively. In the following "Presentation," students will learn how to communicate what they want to say to as large an audience as possible and how to get feedback easily.

Number of Credits
2 credits
Students must attend all the sessions/classes and submit all the required assignments.

Evaluation /Grading
Contribution to the class, and Submitted assignments and reports
(For the details, please see the course syllabus.)

Language
English
(English language ability to read, write, communicate, and actively participate in discussions is required. If you prefer to take the course in Japanese, please register in the 2022 First Semester Freshman Course.)

Year
New and Current Students
Compulsory/required subjects for those in Schools of Physical Sciences, Multidisciplinary Sciences (except three-year doctoral course students of Department of Statistical Science), Life Science, and Advanced Sciences.

2. Class Schedule

<table>
<thead>
<tr>
<th>Date</th>
<th>Time</th>
<th>Session</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tuesday Oct. 5</td>
<td>10:40 – 12:10</td>
<td>Exploring Diversity in Academia (EDA)</td>
</tr>
<tr>
<td></td>
<td>12:10 – 13:00</td>
<td>(Lunch Break)</td>
</tr>
<tr>
<td></td>
<td>13:00 – 14:30</td>
<td>Exploring Diversity in Academia (EDA)</td>
</tr>
<tr>
<td></td>
<td>14:40 – 16:10</td>
<td></td>
</tr>
<tr>
<td></td>
<td>16:20 – 17:50</td>
<td>Online gathering</td>
</tr>
<tr>
<td>Wednesday Oct. 6</td>
<td>13:00 – 14:30</td>
<td>Researchers and Society [1]: Introduction and Research Integrity</td>
</tr>
<tr>
<td></td>
<td>14:40 – 16:10</td>
<td></td>
</tr>
<tr>
<td></td>
<td>16:20 – 17:50</td>
<td></td>
</tr>
<tr>
<td>Thursday Oct. 7</td>
<td>9:00 – 10:30</td>
<td>Researchers and Society [3]: Seeing Your Research from Different Perspectives</td>
</tr>
<tr>
<td></td>
<td>10:40 – 12:10</td>
<td></td>
</tr>
<tr>
<td></td>
<td>12:10 – 13:00</td>
<td>(Lunch Break)</td>
</tr>
<tr>
<td></td>
<td>13:00 – 14:30</td>
<td>Researchers and Society [3]: Seeing Your Research from Different Perspectives</td>
</tr>
<tr>
<td>Friday Oct. 8</td>
<td>9:00 – 10:30</td>
<td>Communication Skills for Researchers [1]: Scientific Writing</td>
</tr>
<tr>
<td></td>
<td>10:40 – 12:10</td>
<td></td>
</tr>
<tr>
<td></td>
<td>12:10 – 12:30</td>
<td>(Lunch Break)</td>
</tr>
<tr>
<td></td>
<td>13:00 – 14:30</td>
<td>Communication Skills for Researchers [2]: Academic Presentation</td>
</tr>
<tr>
<td></td>
<td>14:40 – 16:10</td>
<td></td>
</tr>
<tr>
<td></td>
<td>16:10-16:20</td>
<td>Wrap-up</td>
</tr>
<tr>
<td>ON Demand</td>
<td>Researchers and Society [2]: Social History of Research</td>
<td></td>
</tr>
</tbody>
</table>

3. For Online Participation

(1) All the classes will be conducted via Zoom. Active participation is required for the credit.
(2) Please sign in to Zoom (classroom), 10 mins before the class starts, with the email address you provided when you registered for the Freshman Course. The start and end times of the class(es) may slightly change depending on the progress and content.
(3) Do not share the Zoom information, the Dropbox folders’ links, and the password to the FC website. They are only for the registered students.
(4) Prepare and use a PC or other device with a high-speed Internet connection that has a webcam (including built-in devices), audio microphone (including built-in devices), speakers or earphones/headphones (including built-in devices). We recommend a PC, as there will be times when you need to write texts in classes.

(5) Please find and participate in classes from a quiet environment where you can speak during the class discussions (regardless of whether you are in a laboratory/research institute or at home).

(6) Contact/email to (freshman@ml.soken.ac.jp), if you have internet connection problems. If access to the class is interrupted due to a technical problem with the student's internet connection, we may not be able to provide immediate assistance during the class. If your connection is frequently interrupted, it may be considered as you are not able to fully attend classes, and thus, your grade may not be assessed.

(7) For those students who have difficulty obtaining an adequate network connection for online courses, the university will provide support. Please contact your department office.

4. Zoom Connection Test (Optional)

Tuesday, September 28, 12:00 p.m.- (approximately for 30 mins)

Your participation in the zoom connection test is optional (not mandatory). If you wish to participate, please indicate in the registration form. We will send you the zoom link/information for the connection test by one day before the Tuesday, September 28.

5. How to Register

Registration Deadline: Wednesday September 22, 2021

Who Can Register: First year students enrolled in October 2021
Current Students who have not taken the course before

How to Register: Please access to the registration form below.
https://forms.gle/3N86sHPg2PapJBDZA

The information required in the form are:

- Your email address
- Your department
- Your Student ID
- Name (Last Name and First Name)
- (Question) Do you have a limit on the amount of internet data usage when taking the course? Yes/No
- (Question) Do you want to participate in the zoom connection test (optional) on Tuesday, Sep. 28? Yes/No
- Your image that expresses yourself as a researcher*1
- Brief description of your image (about 100 words)
- Keywords of your research (one to three keywords)

What is the “Image”?

- Images of all the participating students will be listed/displayed on the FC website’s “Participants (E: English)” page. We will use the images in the class/session “Exploring Diversity of Academia (EDA)”
- Any illustration, pictures, and images would be fine, if it expresses your research interest, and show you as a researcher; however, please create that does not cause copyright problems (such as the ones created/photographed by yourself or an image in the public domain).
- Please assume the size as about 300 px X 300 px.
- The image should be jpg or png, and the size should be less than 1MB.
- Save the file title as “Student ID number- Last Name- First Name.”
- See examples on the “Participants examples” page.

*1
6. After Registration

We will send you an email with the following information after Wednesday, September 22. Then, please submit: “an episode with unexpected social impacts”, by Tuesday, October 5. Please refer to [2] below for details.

[1] Password will be sent to login the FC website (https://freshman.soken.ac.jp). Please Click on the "Information" page to see (the following items may change as we are renewing the website now):
- Class schedule (calendar) and Zoom Information
- Dropbox folder link(s) to download class materials
- Submission form/links for classes
- Important notice for taking the online course
- Class details and list of instructors

[2] In the “Seeing Your Research from Different Perspectives” session on October 7, we will work on and discuss critical issues and cases within your research field that may have some degree of significant social impacts and influence.

Submit the following items to describe the episode via the FC “Information” website. The submission deadline is **Tuesday, October 5**.

1. When did it happen?
2. What people (or things) are involved?
3. Please show two perspectives on the episode (perspective #1 and #2).
4. Notes to summarize the main points of your episode.

**What is the “Episode”?**
- A "true" story that can be found in your research field (e.g. you can search in internet, or ask your colleagues), and/or based on your research experience.
- Such episodes/cases (with unexpected social impacts) that are well-known within your research field, but may not be so familiar for researchers in other fields and/or general public.
- If you cannot find any, it is also fine to prepare an episode in related research fields (preferably close to your research field).

**[Example of the Episode]**

Episode: “Starlink” satellites launched by Space X American aerospace company.

1. When: Since 2019 (first Starlink launch)
2. Related people or things: Satellites, people all over the world, astronomers
3. Perspective #1: Benefits of low-cost, high-performance satellite Internet access service
   Perspective #2: Serious light pollution problem for ground-based observation by astronomers
4. Notes: Improvements in communication technology by Starlink satellites have made it possible to connect to high-speed Internet from anywhere in the world. However, the satellites reflect enough sunlight at night which causes a serious problem for sensitive telescopes.

If you have any questions, please contact The Center for Educational Development (ced_edu@ml.soken.ac.jp).