

In the Midst of the New Coronavirus Epidemic:

~ Messages from faculty members of the Open University of Japan ~

1. “The Intrinsic Nature of the New Coronavirus” by Professor Nikoh Naruo, Nature and Environment course
2. “Measures against Viral Infection” by Professor Tashiro Takao, Living and Welfare course
3. “Maintaining Social Distance” by Professor Mori Tsutako, Psychology and Education course
4. “The Basics of Information Acquisition and Distribution – Things to remember in an emergency and in everyday life” by Professor Tatsumi Takeo, Informatics course
5. “Surmising the Various Circumstances of Diverse People” by Professor Kitagawa Yukihiro, Society and Industry course
6. “Benefits of Reading Books” by Professor Kondo Shigekazu, Humanities and Culture course, head of the Open University of Japan Library
7. “Safety Tips for Exercising Outdoors” by Professor Sekine Noriko, Living and Welfare course
8. “Life with the Risk of Viral Infection from the Viewpoint of Risk Management — A closing summary” by Professor Nara Yumiko, Living and Welfare course

[The Epitome](#) - Messages from all members appearing in the series

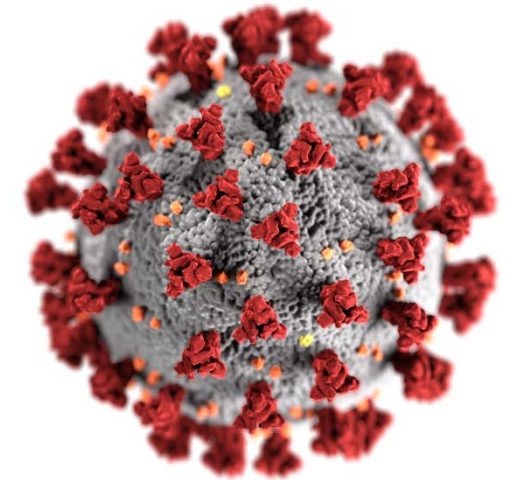
What is a virus?

- It can only multiply in a living **cell**.
- It has clever mechanisms that make use of cells.
 - Entering a cell
 - Multiplying in the cell
 - Leaving the cell

Viral Entry

Viral Replication

Viral Release



An illustration of the new coronavirus
(CDC/ Alissa Eckert, MS; Dan Higgins, MAMS)

Mechanisms of a viral infection



washing hands, wearing a mask
immune system
vaccines, antiviral drugs

Measures to avoid viral infection:

- Disrupt the life cycle of a virus. How?

Measures against Viral Infection

- PCR (polymerase chain reaction) is a method of detecting the coronavirus by amplifying the genome of the coronavirus by a trillion fold.
- Testing negative **does not necessarily mean the person is definitely not infected** – “**false negative**”
- An environment with the “**Three Cs**” (**c**losed spaces, **c**rowded places, **c**lose-contact settings) increases the risk of **spreading the infection**.
- **Completely avoiding the “Three Cs” will lower the possibility of infection.**
- If there are no new infections in an area for 4–8 weeks, **the number of infected individuals will decrease.**
- To contain the infection, a vaccine is necessary, but it is expected to take more than a year before it is developed.
- Until a vaccine is available, it is important to **prevent infection through early detection, early quarantine, early diagnosis, and early treatment.**

Maintaining the Social Distance

- Social distancing can lead to social isolation, which becomes a great risk factor for physical and mental health.
- It is necessary to reduce the psychological distance while maintaining sufficient physical distance.
- This is an unnatural move contrary to conventional practice. Getting used to it will take time.



Logo prepared by Tokyo Metropolitan Government

1. Information under social instability

Fake news

- is incorrect news.

- Intentional fake news
 - Influence peddling
 - Entertainment
- Unintentional fake news
 - Inadvertence
 - Complexity/difficulty

Infodemic

- is the excessive spread of information.

- Wanting to spread an important piece of information to everyone
- Why important?
 - Safety awareness
 - Sense of justice
 - Influence peddling

2. Resilience and universal design in ICT

Resilience

- is, generally speaking, the ability to maintain or recover safety through flexible responses or adaptation to a sudden change in the environment or in adversity.

- Information crisis management
 - Preparation for emergency
 - Behavior at the time of emergency
- Dilemmas

Universal design

- is an approach to information designing for various people.

- Printing a document, scanning it, converting it to a PDF, and posting it
 - Makes it difficult to reuse the data.
- Impaired sense of sight and hearing
- Physical handicap
- Foreign language speakers

Surmising the Various Circumstances of Diverse People

- Social inequality becomes apparent in times of emergency.
- Ignoring inequality will lead to an unstable society.
- Surmise the circumstances in which diverse people are placed.
- Create a society that does not tolerate discrimination.

Spanish flu (1918–1920), Plague (1346–1351)

Difference between the Middle Ages and the present day

- People in the present day know how to deal with viruses.
- The amount and speed of people traveling has increased substantially.

Reading the Period through Books

- Reading books → Reading the period
- Reading the period → Living the era, Pioneering the new age

Safety Tips for Exercising Outdoors

Avoid the crowd

- Wear a face mask
- Keep your distance from others



Control your activity

- Avoid the adverse effects of exercising with a face mask
- Control your activity according to your condition

Beware of heat stroke

- Consider heat acclimatization
- Reduce your exercise intensity in hot weather



Prevent infection when drinking water

- Do not touch the surface of your face mask
- Do not touch the spout

Two Viewpoints when Considering the Risk of Viral Infection and Everyday Life

Think about the issue as part of risk management in your everyday life

- Risk management
 - Management process for risk reduction
 - Being a participant and taking a meta position simultaneously



Think about the issue as a matter of resilience in our everyday life.

- Resilience
 - The ability to flexibly recover from and adapt to crisis and adversity
- Humans have lived with viruses for centuries
- To create a resilient living environment and society that can continue to coexist with viruses