

Section 11 Trends in digital usage

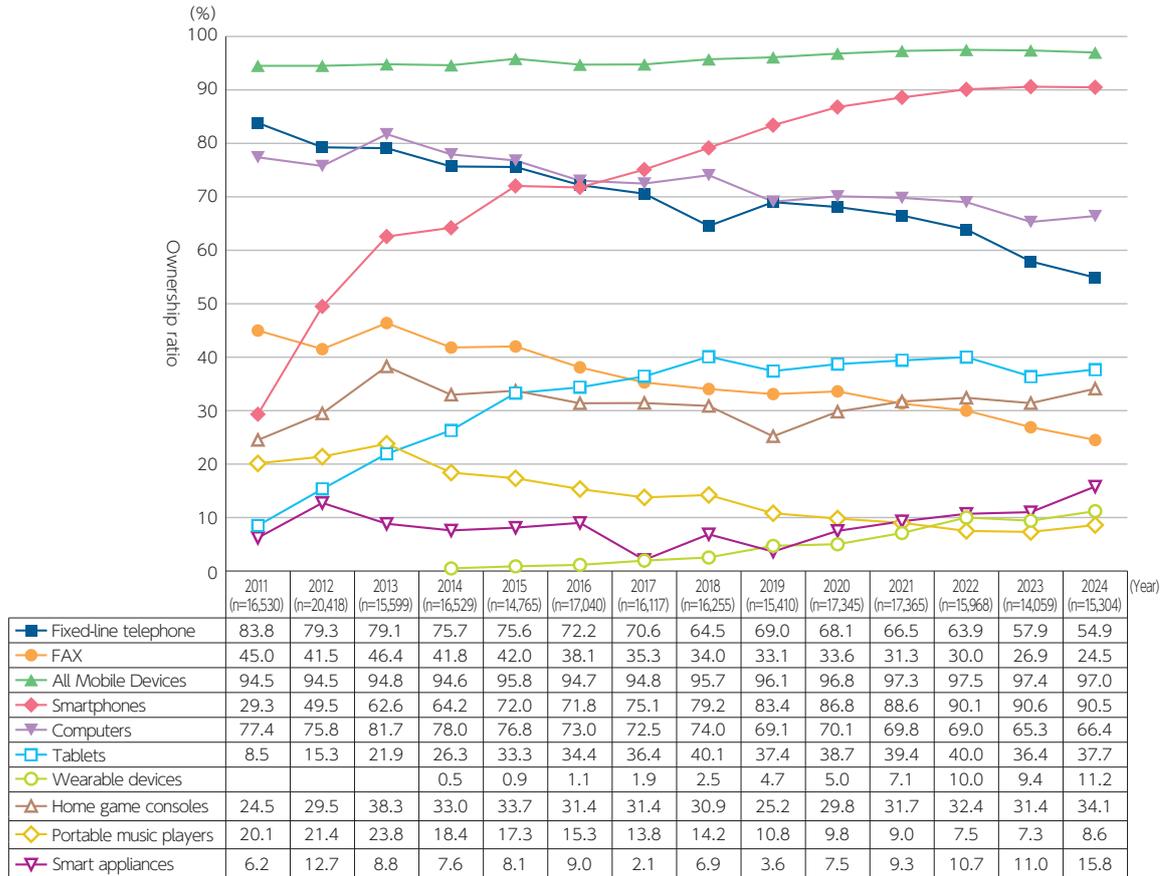
1. Trends in digital usage in the daily life of the citizens

(1) Information and communication devices and terminals

Regarding the terminals necessary for connecting to the Internet and utilizing digital services, the household ownership rate of information and communication devices in 2024 was 97.0% for “All Mobile Devices,” with

“Smartphones” accounting for 90.5% of that figure. Additionally, the ownership rate for personal computers was 66.4% (Figure 2-1-11-1).

Figure 2-1-11-1 Changes in the rate of household ownership of ICT devices



* Includes no responses

(Source) MIC “Communications Usage Trend Survey”¹

(2) Internet

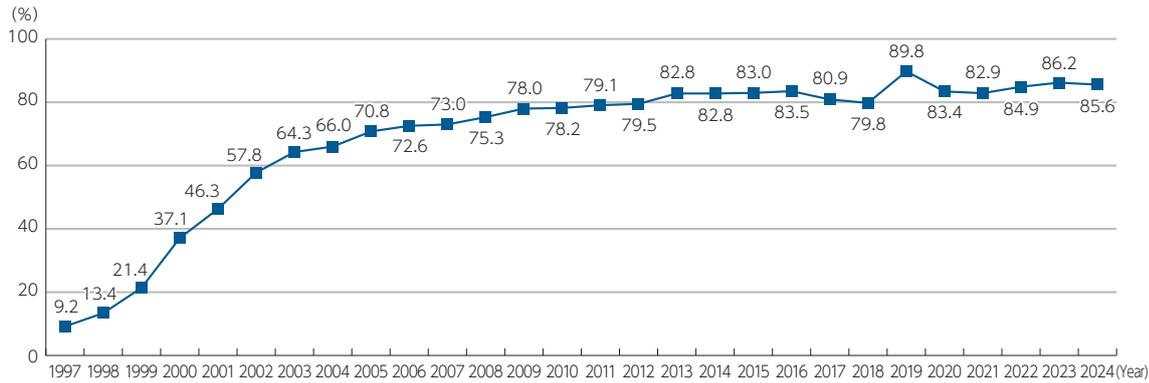
A Usage status

The Internet usage rate (individual) in 2024 was 85.6% (Figure 2-1-11-2). When broken down by device, the Internet usage rate (individual) for “Smartphones”

(74.4%) surpassed that for “Personal Computers” (46.8%) by 27.6 percentage points.

¹ <https://www.soumu.go.jp/johotsusintokei/statistics/statistics05.html>

Figure 2-1-11-2 Changes in Internet usage rate (individuals)²



(Source) MIC "Communications Usage Trend Survey"



Figure (related data) Device types of Internet use (individuals)

Source: MIC "Communications Usage Trend Survey"

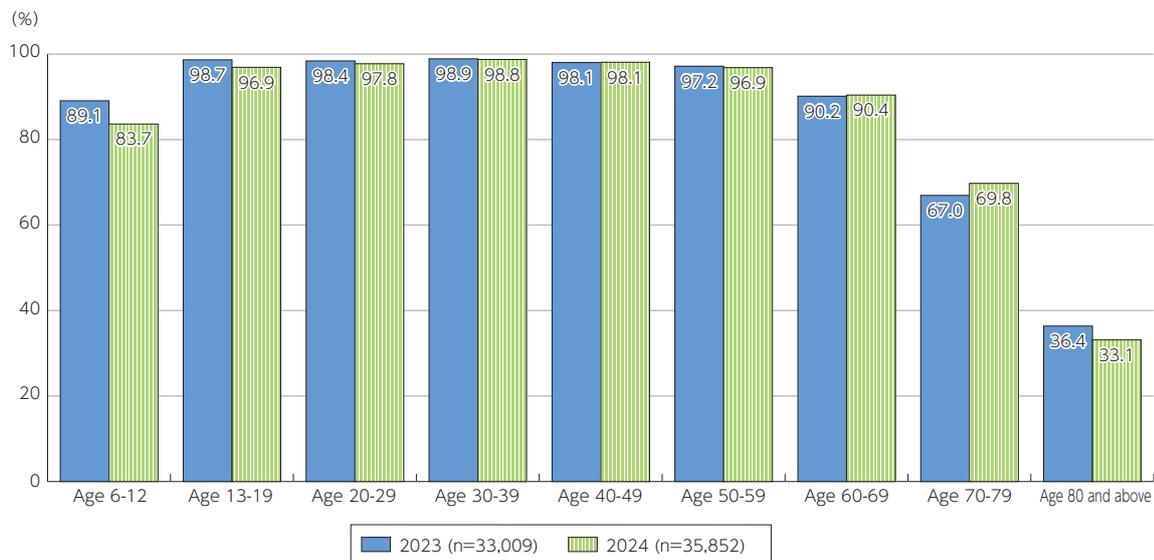
URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00294>

(Data collection)

Examining the Internet usage rate by age group, it exceeds 90% for each group from ages 13 to 69, while it tends to decrease as the age group rises beyond 70 years old (Figure 2-1-11-3). Additionally, the Internet usage rate by household income shows that it exceeded

80% for all income brackets above 4 million yen (Figure 2-1-11-4). Furthermore, by prefecture, 38 prefectures had an Internet usage rate exceeding 80%, and in all prefectures, the usage rate for smartphones exceeded 60%.

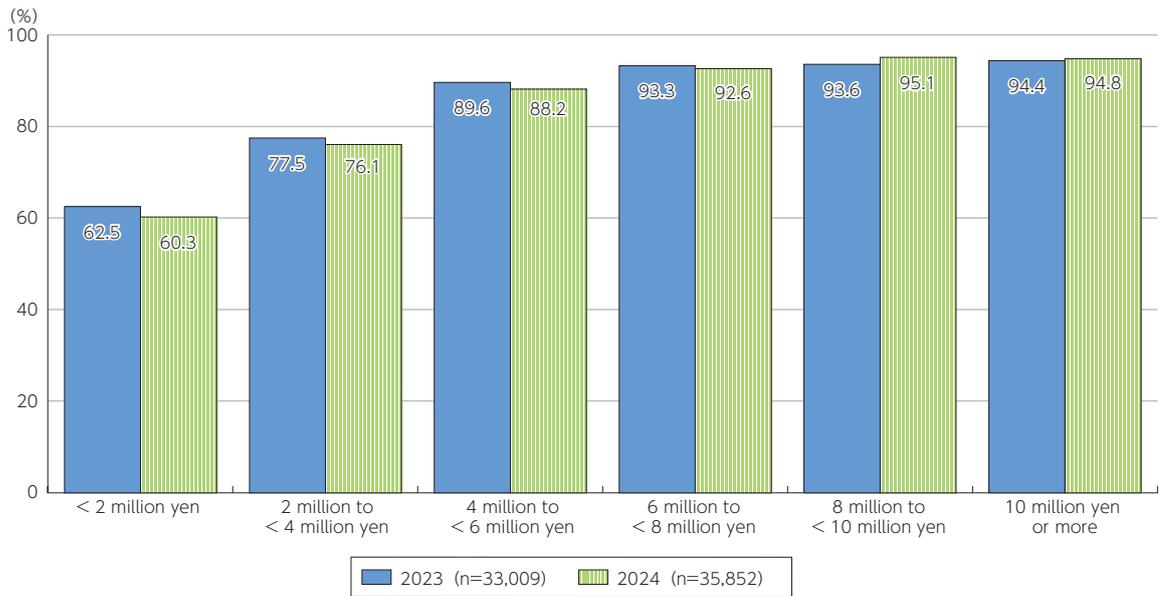
Figure 2-1-11-3 Internet usage rate by age group



(Source) MIC "Communications Usage Trend Survey"

² The design of the questionnaire in the 2019 survey was partially different from that in previous years, so care should be taken when comparing data across years.

Figure 2-1-11-4 Internet usage rate by annual household income



(Source) MIC "Communications Usage Trend Survey"



Figure (related data) Rate of Internet usage by prefecture and the status of usage by device (individuals) (2024)

Source: MIC "Communications Usage Trend Survey"

URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#00297>

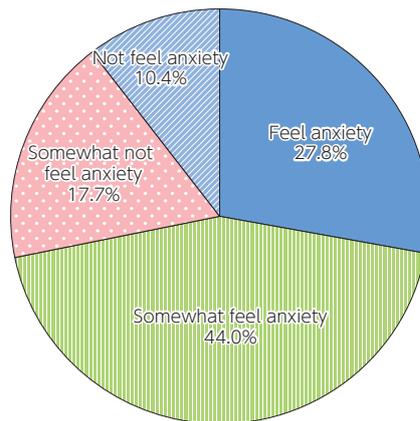
(Data collection)

B Concerns about Internet usage

Approximately 70% of Internet users felt some form of anxiety when using the Internet (Figure 2-1-11-5). The specific concerns included "Leakage of Personal Information and Internet Usage History" at 90.2%, fol-

lowed by "Infection by Computer Viruses" at 61.6%, and "Fraudulent Billing or Internet Scams" at 53.9% (Figure 2-1-11-6).

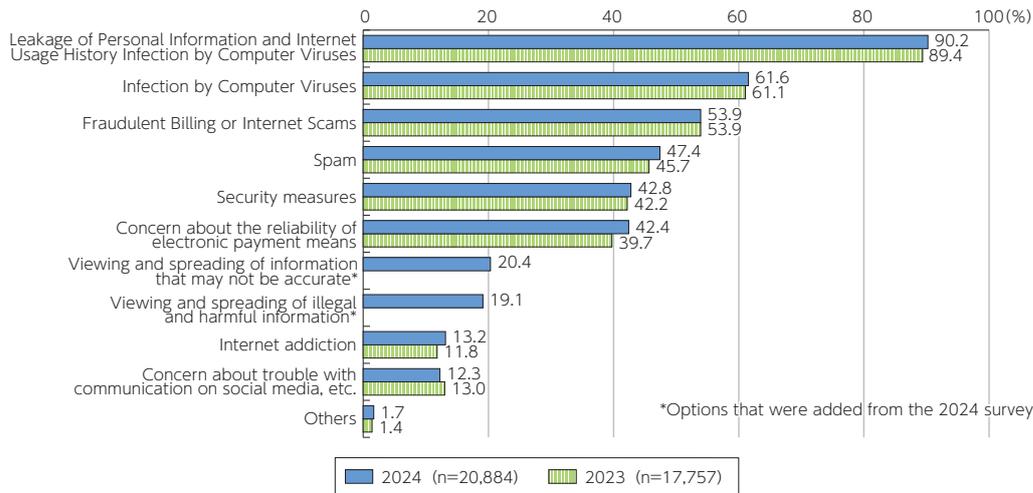
Figure 2-1-11-5 Percentage of individuals who feel anxiety when using the Internet



2024 (n=28,413)

(Source) MIC "Communications Usage Trend Survey"

Figure 2-1-11-6 Anxiety felt when using the Internet (multiple answers allowed)



(Source) MIC “Communications Usage Trend Survey”

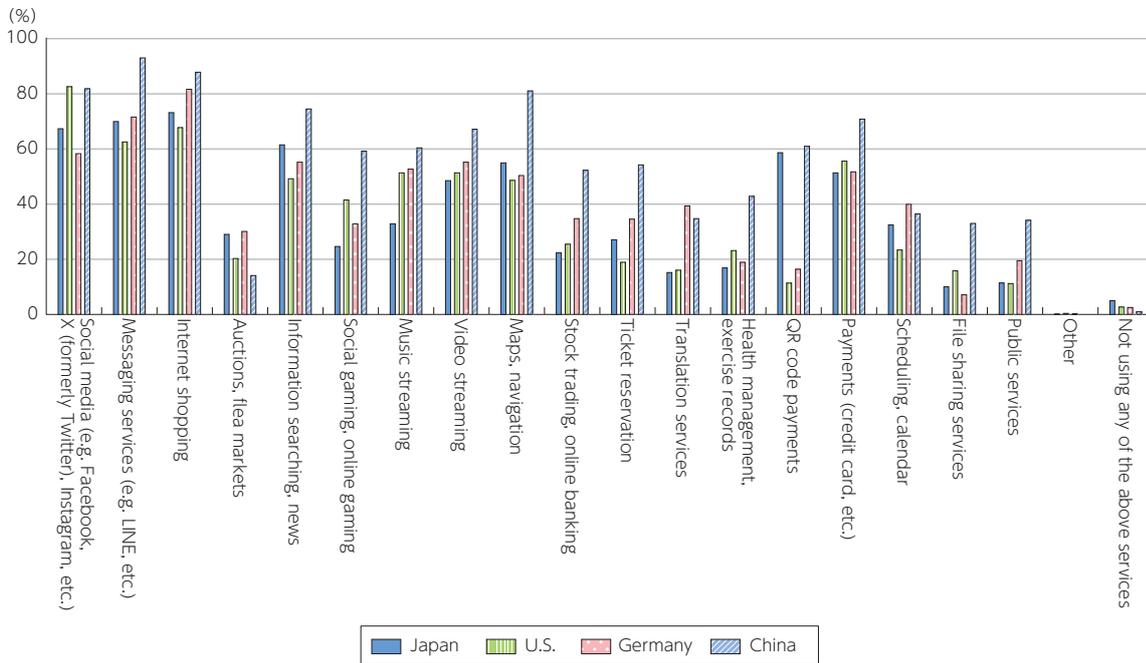
(3) Utilization of digital services

A General utilization of digital services

A survey was conducted in Japan, the U.S., Germany, and China regarding the digital services people commonly use. In Japan, the services with over 60% usage included “Internet Shopping,” “Messaging Services,” “Social Media,” and “Information Search and News,” which were higher compared with other services. The

relatively high usage of “QR Code Payments” in Japan can be attributed to the widespread use of smartphones, promotional campaigns by QR code payment providers, government initiatives to promote cashless transactions, and support for small and medium-sized enterprises (Figure 2-1-11-7).

Figure 2-1-11-7 Status of overall usage of digital services



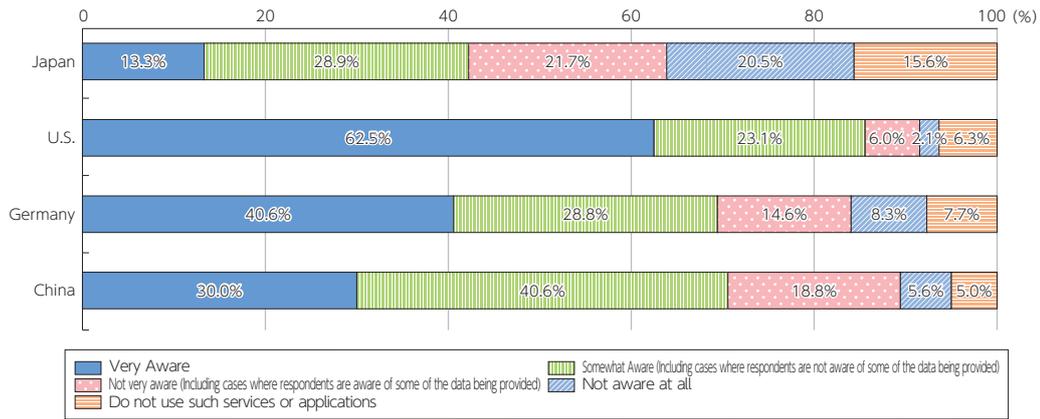
(Source) MIC (2025) “Survey Research on R&D on the Latest Information and Communications Technologies and Trends of Use of Digital Technologies in Japan and Abroad”

Additionally, when asked whether they were aware of providing personal data when using services or applications offered by platform companies, the percentage of respondents who answered “Aware” (sum of “Very Aware” and “Somewhat Aware”) was highest in the U.S. (85.6%), while in Japan it was 42.2% (Figure 2-1-11-8).

When asked about their concerns, the most common

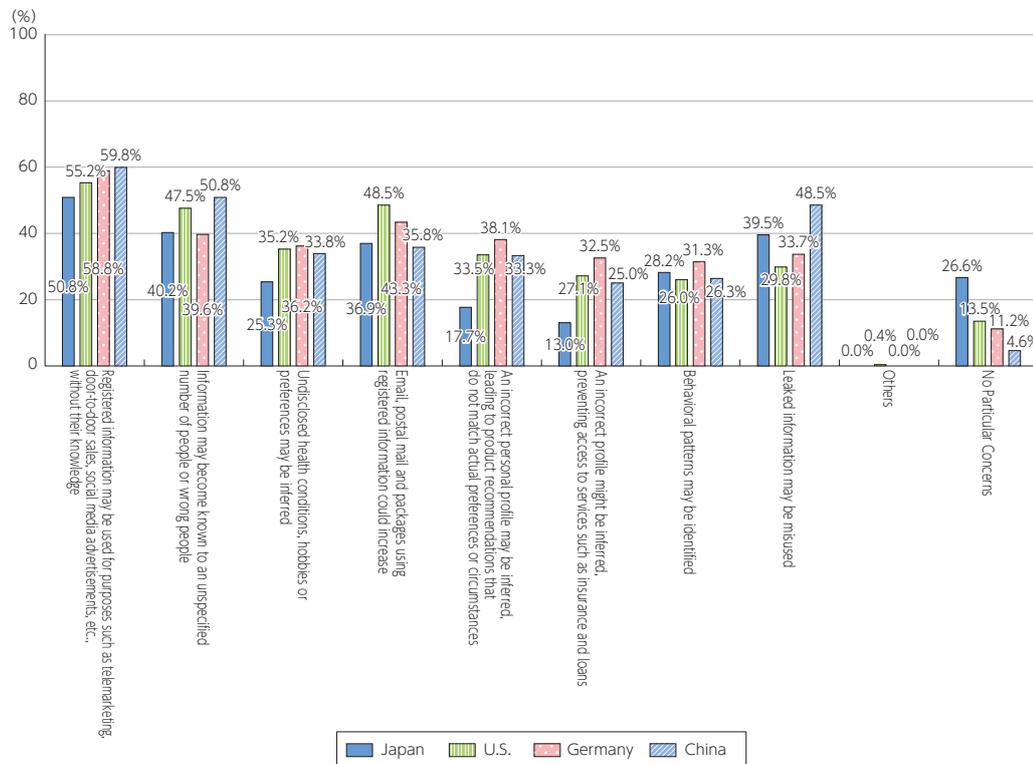
concern across all countries, including Japan, was that “registered information may be used for purposes such as telemarketing, door-to-door sales, social media advertisements, etc., without their intention.” On the other hand, the percentage of respondents in Japan who answered “No Particular Concerns” was 26.6%, which was higher than other countries (Figure 2-1-11-9).

Figure 2-1-11-8 Awareness concerning the provision of personal data



(Source) MIC (2025) "Survey Research on R&D on the Latest Information and Communications Technologies and Trends of Use of Digital Technologies in Japan and Abroad"

Figure 2-1-11-9 Concerns regarding services which require the provision of personal data



(Source) MIC (2025) "Survey Research on R&D on the Latest Information and Communications Technologies and Trends of Use of Digital Technologies in Japan and Abroad"

When asked about the conditions under which they would be willing to provide personal data to platform companies, the number of respondents who chose "no worry about the data being leaked," "no worry about companies misusing data," and "protection of privacy is

ensured" was particularly high in Japan compared to other countries. The increase in opportunities to provide personal data and to set conditions for its use may have raised awareness among users.



Figure (related data) Conditions under which users are willing to provide personal data

Source: MIC (2025) "Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally"

URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00303>

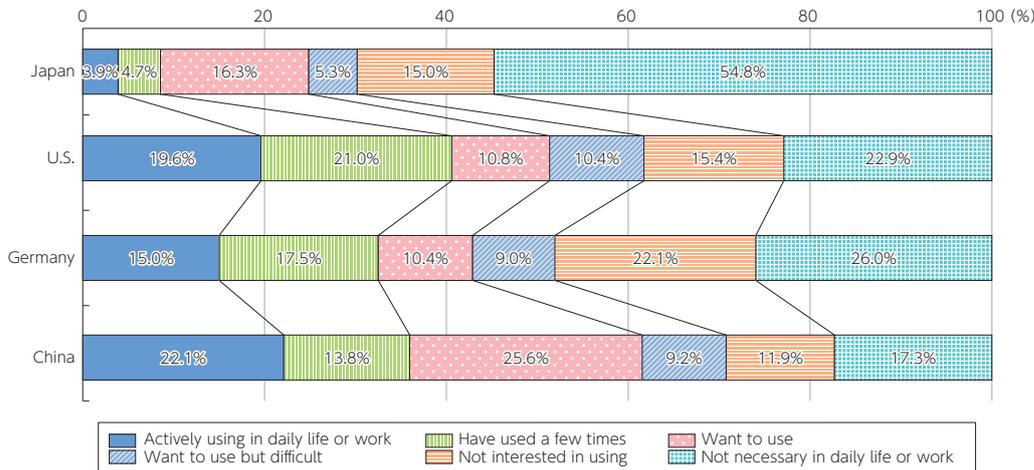
(Data collection)

B Utilization of digital services in virtual spaces (XR content)

The percentage of respondents who have used experiential entertainment services in virtual spaces³ (sum of “Actively Using in Daily Life or Work” and “Have Used a Few Times”) was about 30-40% in the U.S., Germany, and China, while in Japan it was significantly lower at 8.5%. The percentage of respondents who indicated low intention to use such services (sum of “Not Necessary

in Daily Life or Work” and “Not Interested in Using”) was 69.8% in Japan, which was higher than other countries (Figure 2-1-11-10). Looking at the usage in Japan by age group, the usage rate was highest among respondents in their 40s (12.1%), and the percentage of those who “Want to Try Using It in the Future” was highest among respondents in their 20s (25.7%).

Figure 2-1-11-10 Usage of experiential entertainment services in virtual spaces (comparison by country)



(Source) MIC (2025) “Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally”



Figure (related data) Usage of experiential entertainment services in virtual spaces (by age)

Source: MIC (2025) “Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally”

URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00305>

(Data collection)



Figure (related data) Reasons why people do not use entertainment services in virtual spaces

Source: MIC (2025) “Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally”

URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00306>

(Data collection)

C Media usage time

Since 2012, the MIC’s Institute for Information and Communications Policy has been conducting joint research with Professor Emeritus HASHIMOTO Yoshiaki of the University of Tokyo, Professor KITAMURA Satoshi of Tokyo Keizai University, and others⁴ on the us-

age time, time slots, purposes, and reliability of information and communication media⁵. Below is an overview of the usage time of information and communication media based on the FY2024 survey results⁶.

³ XR content (experiential entertainment services in virtual space) is a type of services in which users have interactive relationships with others in real-time, such as online games and virtual events.

⁴ Assistant Professor KAWAI Daisuke in School of Cultural and Creative Studies in Aoyama Gakuin University

⁵ “Survey on Usage Time of Information and Communications Media and Information Behavior”: 1,800 men and women aged 13 to 79 (selected by sex and age group (in 10 years increments) in proportion to the actual situation in the Basic Resident Register; the register of January 2024 was used for the FY2024 survey) were visited and received questionnaires based on random location quota sampling. The FY2024 survey was conducted from December 2 to December 8, 2024.

⁶ In the past, the survey targeted 1,500 people between the ages of 13 and 69, but the 2024 survey targeted 1,800 people, including those in their 70s, and therefore the figures for “all age groups” are calculated as the overall figures for those between the ages of 13 and 79. Accordingly, figures for “all age groups” from past survey results have been recalculated to include figures for those in their 70s, which had previously been surveyed and collected for reference purposes, and therefore those figures may not necessarily match the figures of the survey results published until last year.

(A) Average usage time⁷ and user rate⁸ of major media

The average usage time and user rate of “Real-time TV Viewing,”⁹ “Recorded TV Viewing,” “Internet Usage,”¹⁰ “Newspaper Reading,” and “Radio Listening” are shown in (Figure 2-1-11-11).

The FY2024 survey results showed that for all age groups combined, the average usage time for “Internet Usage” was the longest on both weekdays and holidays, followed by “Real-time TV Viewing.” The user rate for “Internet Usage” exceeded that of “Real-time TV Viewing” on both weekdays and holidays.

By age group, the average usage time for “Internet Usage” on holidays exceeded that of “Real-time TV Viewing” for the first time among those in their 40s. The user rate for “Internet Usage” exceeded that of “Real-time TV Viewing” on both weekdays and holidays for those in their teens to 50s. Additionally, the user rate for “Newspaper Reading” increased with age from the 20s, but compared with the previous FY2023 survey results, the user rate for those in their 40s to 70s either decreased or remained almost flat.

⁷ The total number of hours of all people surveyed for a particular information behavior per survey day, divided by the number of people surveyed. The average time is calculated by including the respondents who did not do the activities throughout the day.

⁸ For weekdays, the ratio of people who performed a particular information behavior for each day of the two survey days was calculated and averaged over the two days. For holidays, this is the ratio of survey days.

⁹ Television viewing (real-time): Real-time television viewing with any device not limited to TV receiver.

¹⁰ Internet use: The use of services over an Internet connection, including email, website, social media, video sites, and online games, regardless of device.

Figure 2-1-11-11 Average usage time and user rate of major media

<Weekday (one day)>

		Average usage time (Unit: minutes)					Doers' ratio				
		Television viewing (real-time)	Television viewing (recorded program)	Internet use	Newspaper reading	Radio listening	Television viewing (real-time)	Television viewing (recorded program)	Internet use	Newspaper reading	Radio listening
All age groups combined	2020	193.2	20.4	149.3	13.1	15.6	84.0	19.1	81.3	31.2	9.2
	2021	171.9	19.0	156.3	11.5	14.3	77.6	18.7	82.9	28.4	7.2
	2022	163.5	20.5	154.7	10.4	10.0	77.2	17.8	83.9	25.2	6.9
	2023	162.9	18.4	173.6	9.3	9.4	75.1	16.2	85.3	22.1	6.6
	2024	154.7	18.1	181.8	9.0	11.8	72.1	15.1	87.0	20.3	6.5
10s	2020	73.1	12.2	224.2	1.4	2.3	59.9	14.8	90.1	2.5	1.8
	2021	57.3	12.1	191.5	0.4	3.3	56.7	16.3	91.5	1.1	0.7
	2022	46.0	6.9	195.0	0.9	0.8	50.7	10.0	94.3	2.1	1.8
	2023	39.2	3.6	257.8	0.0	0.8	47.1	5.7	96.4	0.0	2.1
	2024	39.7	2.8	243.4	0.5	0.0	35.0	2.9	93.9	2.5	0.0
20s	2020	88.0	14.6	255.4	1.7	4.0	65.7	13.6	96.0	6.3	3.1
	2021	71.2	15.1	275.0	0.9	7.0	51.9	13.7	96.5	2.6	3.0
	2022	72.9	14.8	264.8	0.4	2.1	54.4	11.8	97.7	2.8	2.3
	2023	53.9	6.2	225.8	0.5	4.8	43.3	7.4	98.4	1.8	2.8
	2024	52.6	5.6	257.2	0.3	2.1	48.4	7.1	97.0	1.4	1.1
30s	2020	135.4	19.3	188.6	1.9	8.4	78.2	19.4	95.0	8.8	6.0
	2021	107.4	18.9	188.2	1.5	4.8	65.8	20.9	94.9	5.9	3.2
	2022	104.4	14.6	202.9	1.2	4.1	67.1	14.9	95.7	4.1	3.9
	2023	89.9	13.7	201.9	0.5	2.5	64.5	13.3	94.0	3.9	4.1
	2024	80.2	9.7	225.8	1.3	4.7	59.9	10.1	96.6	4.6	3.1
40s	2020	151.0	20.3	160.2	5.5	11.7	86.2	23.0	92.6	24.1	6.0
	2021	132.8	13.6	176.8	4.3	12.9	77.8	15.3	94.6	17.9	5.4
	2022	124.1	17.2	176.1	4.1	5.5	75.7	18.0	91.5	16.5	6.3
	2023	134.6	13.7	176.2	2.7	7.2	78.3	15.7	93.0	11.2	5.4
	2024	117.5	11.0	200.3	1.9	11.7	71.4	12.1	94.9	6.9	5.9
50s	2020	195.6	23.4	130.0	11.9	26.9	91.8	20.7	85.0	39.4	13.4
	2021	187.7	18.7	153.6	9.1	23.6	86.4	20.9	89.4	33.8	11.1
	2022	160.7	18.6	143.5	7.8	14.0	84.0	19.5	88.8	29.6	8.6
	2023	163.2	21.2	173.8	7.6	8.6	81.2	19.4	90.0	27.3	7.5
	2024	159.0	16.5	181.0	6.3	13.0	79.7	14.7	89.7	22.0	7.0
60s	2020	271.4	25.7	105.5	23.2	18.5	92.9	22.3	71.3	53.7	12.1
	2021	254.6	25.8	107.4	22.0	14.4	92.0	23.0	72.8	55.1	10.0
	2022	244.2	30.5	103.2	17.7	16.7	92.8	25.2	78.5	46.1	9.9
	2023	257.0	31.3	133.7	15.9	15.2	91.5	23.1	79.8	39.4	7.6
	2024	226.7	37.2	151.3	14.8	18.0	88.2	27.3	84.9	35.6	9.0
70s	2020	352.3	21.9	47.3	37.3	27.7	95.9	15.6	46.5	61.5	16.8
	2021	305.9	25.2	50.4	33.7	25.0	94.0	19.1	48.4	60.5	12.1
	2022	306.3	32.2	50.0	32.8	19.9	95.2	19.6	50.7	56.0	11.6
	2023	304.6	28.6	69.2	30.1	20.2	95.1	20.8	55.4	52.2	12.8
	2024	310.7	32.8	72.4	30.5	23.4	94.3	23.3	59.6	52.9	14.1

<Holiday (one day)>

		Average usage time (Unit: minutes)					Doers' ratio				
		Television viewing (real-time)	Television viewing (recorded program)	Internet use	Newspaper reading	Radio listening	Television viewing (real-time)	Television viewing (recorded program)	Internet use	Newspaper reading	Radio listening
All age groups combined	2020	247.4	36.7	154.2	12.4	10.0	82.7	25.4	77.8	28.2	6.2
	2021	213.9	25.5	154.2	10.6	9.0	77.9	20.5	79.3	24.9	5.0
	2022	207.2	30.2	164.3	10.2	7.3	76.2	22.1	81.8	23.6	5.3
	2023	202.0	23.8	179.7	8.7	6.6	73.2	18.0	82.2	20.5	4.7
	2024	182.7	25.0	183.7	8.5	7.9	69.1	17.4	83.7	18.5	4.1
10s	2020	93.9	29.8	290.8	0.9	0.0	54.9	25.4	91.5	1.4	0.0
	2021	73.9	12.3	253.8	0.0	0.0	57.4	14.9	90.8	0.0	0.0
	2022	69.3	17.4	285.0	1.0	2.8	46.4	19.3	92.9	2.1	2.1
	2023	56.8	4.8	342.2	0.0	0.0	42.9	6.4	95.0	0.0	0.0
	2024	41.7	7.2	316.1	0.4	0.0	31.4	8.6	92.1	1.4	0.0
20s	2020	132.3	26.5	293.8	2.0	1.9	64.3	20.2	97.2	6.6	2.3
	2021	90.8	17.2	303.1	0.7	1.8	49.3	14.0	97.2	2.3	1.4
	2022	89.6	25.1	330.3	0.5	1.0	48.4	16.1	96.8	2.3	1.4
	2023	66.0	15.0	309.4	0.2	1.0	41.0	11.1	97.2	0.9	1.4
	2024	62.7	11.3	302.7	0.3	0.0	43.1	9.2	94.5	0.5	0.0
30s	2020	198.1	45.0	191.3	1.6	7.4	77.2	31.6	91.2	5.6	3.2
	2021	147.6	30.3	212.3	1.5	3.2	69.6	22.7	92.3	4.0	1.2
	2022	152.5	25.9	199.9	0.8	6.9	63.3	19.6	92.7	3.3	4.1
	2023	121.2	17.8	218.3	1.6	2.3	57.3	14.5	92.1	4.6	2.5
	2024	103.8	14.5	218.4	1.1	2.7	53.6	12.7	95.4	4.2	0.8
40s	2020	232.7	41.5	154.5	5.2	4.2	85.3	28.5	89.3	19.9	3.1
	2021	191.1	28.5	155.7	4.9	6.3	79.0	21.0	91.0	14.8	3.4
	2022	191.0	29.7	157.5	4.6	4.8	76.5	22.9	89.0	16.3	2.8
	2023	188.2	23.1	176.2	2.8	3.1	78.6	21.4	90.7	10.2	2.6
	2024	159.1	21.5	199.0	2.3	7.2	67.3	16.3	94.8	6.5	3.6
50s	2020	256.5	49.8	127.8	12.5	16.3	91.6	31.4	81.5	36.6	7.7
	2021	242.6	28.9	119.0	9.2	14.2	84.8	24.9	82.2	29.6	8.1
	2022	220.5	33.0	134.9	7.6	5.6	85.7	24.8	85.3	24.4	4.6
	2023	225.3	29.0	152.7	7.3	6.3	81.2	21.9	86.5	23.5	3.8
	2024	200.4	32.1	164.9	6.8	9.2	78.2	21.8	85.5	19.1	3.0
60s	2020	334.7	37.2	83.7	22.0	10.9	91.8	25.9	63.1	50.4	9.2
	2021	326.1	31.4	92.7	22.3	11.2	93.5	25.4	71.0	50.4	8.0
	2022	291.4	42.2	105.4	15.0	10.1	92.3	29.8	78.7	45.2	8.5
	2023	307.6	39.8	119.3	14.4	8.6	91.9	24.1	73.0	37.0	5.9
	2024	276.8	42.7	130.8	13.5	10.1	88.9	24.0	77.9	32.8	6.3
70s	2020	375.9	21.3	43.9	34.5	23.0	94.0	13.5	41.8	57.1	14.2
	2021	318.8	21.3	38.5	27.7	19.3	92.8	16.6	41.4	53.8	9.3
	2022	330.9	30.5	47.4	33.9	16.3	96.6	19.4	47.6	53.7	11.2
	2023	329.4	24.4	64.2	27.3	19.5	92.6	17.9	52.0	50.0	13.5
	2024	318.3	31.7	59.7	27.8	19.1	91.9	21.8	54.4	49.7	11.4

(Source) MIC Institute for Information and Communications Policy "FY2024 Survey on Usage Time of Information and Communications Media and Information Behavior"

(B) Position of the Internet as a medium

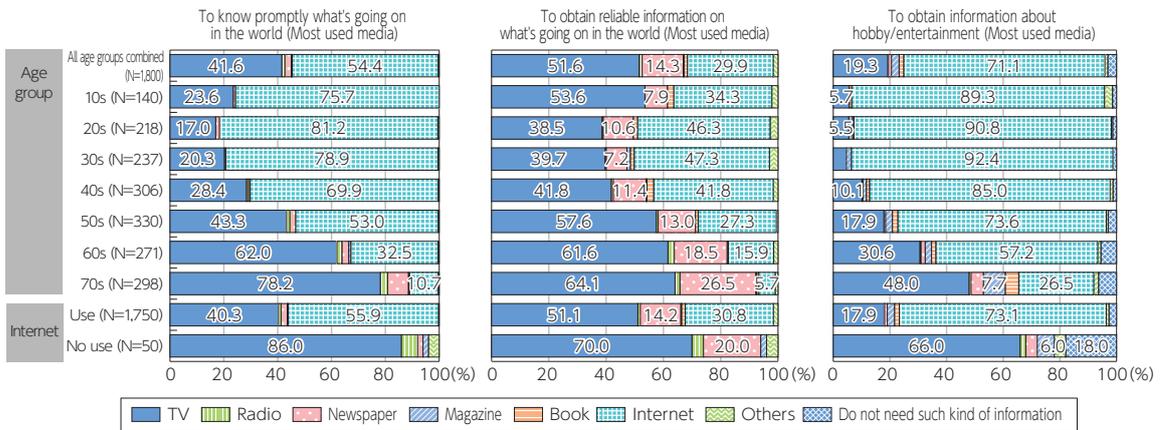
The comparison of the Internet with other media for different usage purposes is shown in (Figure 2-1-11-12).

The Internet was the most used medium for “quickly knowing about events and trends in the world” for all age groups combined. By age group, the “Internet” was most used by those in their teens to 50s, while “TV” was most used by those in their 60s and 70s. For “obtaining reliable information about events and trends in the world,” “TV” was the most used medium for all age groups combined. By age group, the “Internet” was most used by those in their 20s and 30s, “TV” and the

“Internet” were equally used by those in their 40s, and “TV” was most used by other age groups. “Newspapers” were used more than the “Internet” by those in their 60s and 70s.

For “obtaining information about hobbies and entertainment,” the “Internet” was the most used medium for all age groups combined. By age group, the “Internet” was most used by those in their teens to 60s, and “TV” was most used by those in their 70s. The percentage of “Internet” usage was around 90% for those in their teens to 30s.

Figure 2-1-11-12 Media used by purpose (most used media by all groups, by age group and by using or not using the Internet)



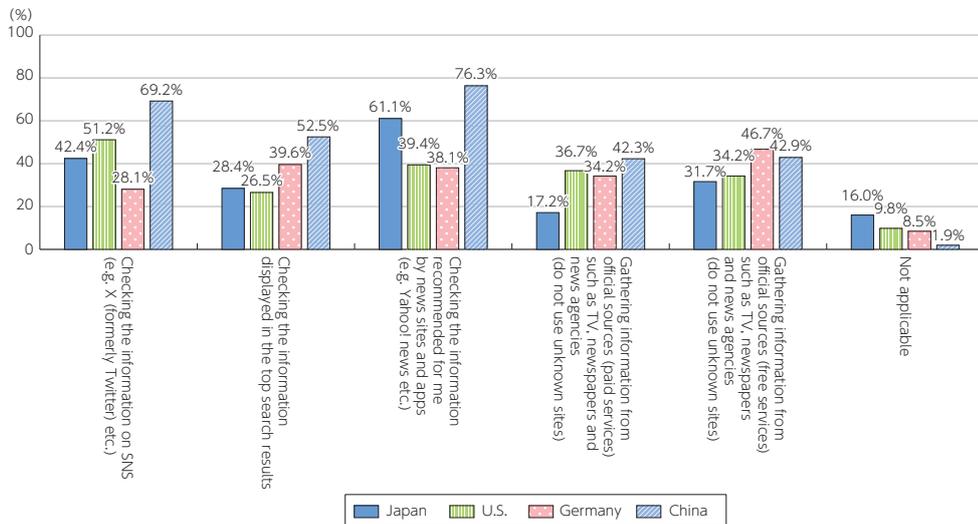
(Source) MIC Institute for Information and Communications Policy “FY2024 Survey on Usage Time of Information and Communications Media and Information Behavior”

D Utilization of Internet media, etc.

When asked about their actions when they want to know the latest news online, the percentage of respondents in Japan who “look at recommended information from news sites/apps” (61.1%) and “look at information

on social media” (42.4%) was high, while relatively fewer people relied on traditional mass media such as TV, newspapers, and news agencies (Figure 2-1-11-13).

Figure 2-1-11-13 Ways to obtain the latest news online (by country)

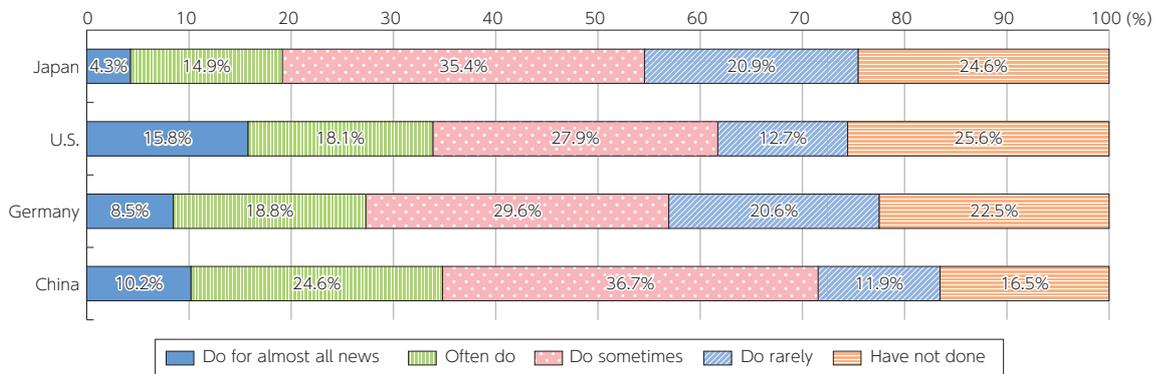


(Source) MIC (2025) “Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally”

When asked whether they check the source (organization or individual) of the information flowing online, the percentage of respondents in Japan who answered

that they do (sum of “Do for Almost All News” and “Often Do”) was 19.1%, lower compared with other countries (Figure 2-1-11-14).

Figure 2-1-11-14 Frequency of checking the source of information (organizations and individuals) (by country)



(Source) MIC (2025) “Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally”



Figure (related data) The proportion of comparing news reports from multiple media (broadcasters, news media and news agencies)
 Source: MIC (2025) “Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally”
 URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00320>
 (Data collection)



Figure (related data) The proportion of checking official information announced by the government etc.
 Source: MIC (2025) “Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally”
 URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00321>
 (Data collection)

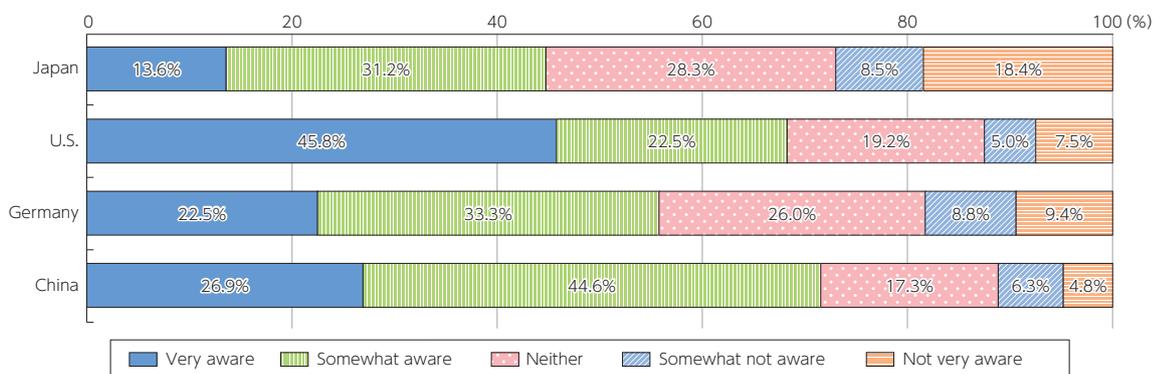


Figure (related data) The proportion of checking the results of verification by experts and fact-checking organizations
 Source: MIC (2025) “Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally”
 URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00322>
 (Data collection)

Additionally, when asked about their awareness of the characteristics of online services and apps (such as searching services and social media), including the “Information displayed, such as search results, social media, videos, and music, is optimized (personalized) for the user,” “Recommended accounts or content on social media may be those that the social media provider wants

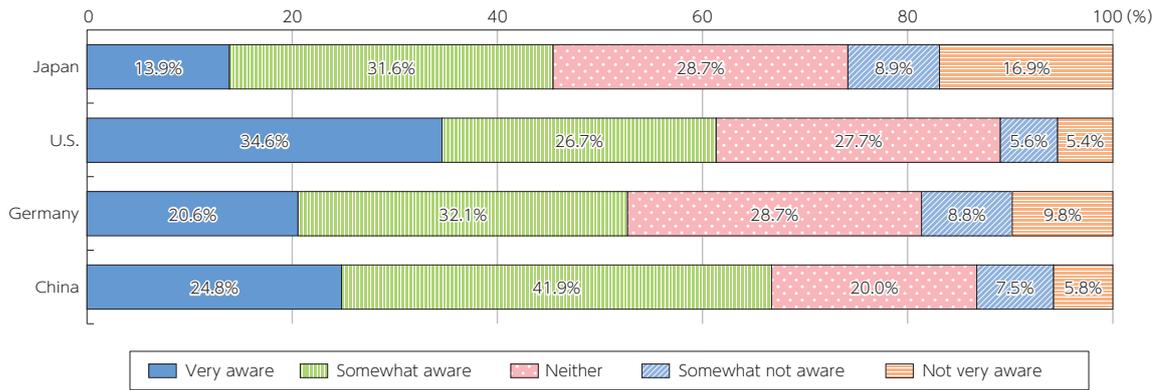
the user to see,” and “Information close to the user’s opinions and thoughts is displayed on social media,” the percentage of respondents in Japan who answered that they were aware (sum of “Very Aware” and “Somewhat Aware”) was below 50% for these items (Figure 2-1-11-15) (Figure 2-1-11-16) (Figure 2-1-11-17).

Figure 2-1-11-15 Awareness that the information displayed in search results and on social media is personalized



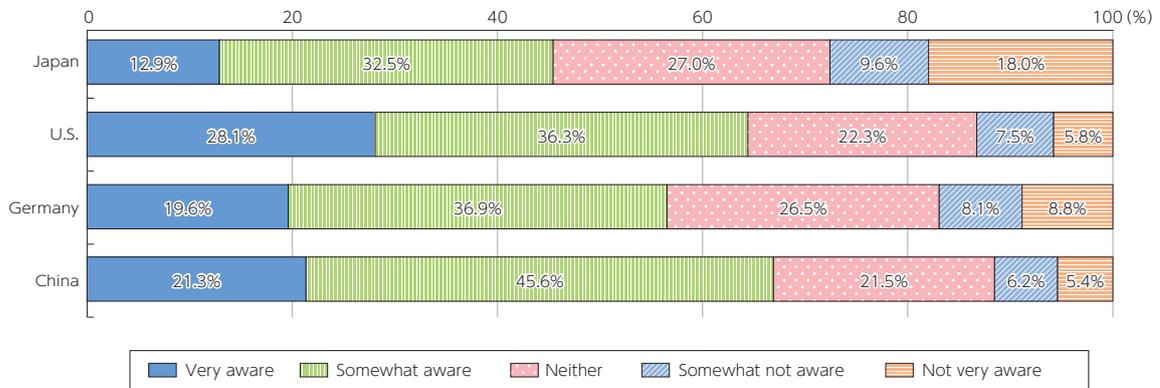
(Source) MIC (2025) “Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally”

Figure 2-1-11-16 Awareness that service providers may display accounts or content they want users to see



(Source) MIC (2025) "Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally"

Figure 2-1-11-17 Awareness that opinions and information similar to the user's views tend to be displayed on social media etc.



(Source) MIC (2025) "Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally"

2. Trends in utilization in corporate activities

(1) The Status of digitalization by companies in each country

A Efforts in digitalization

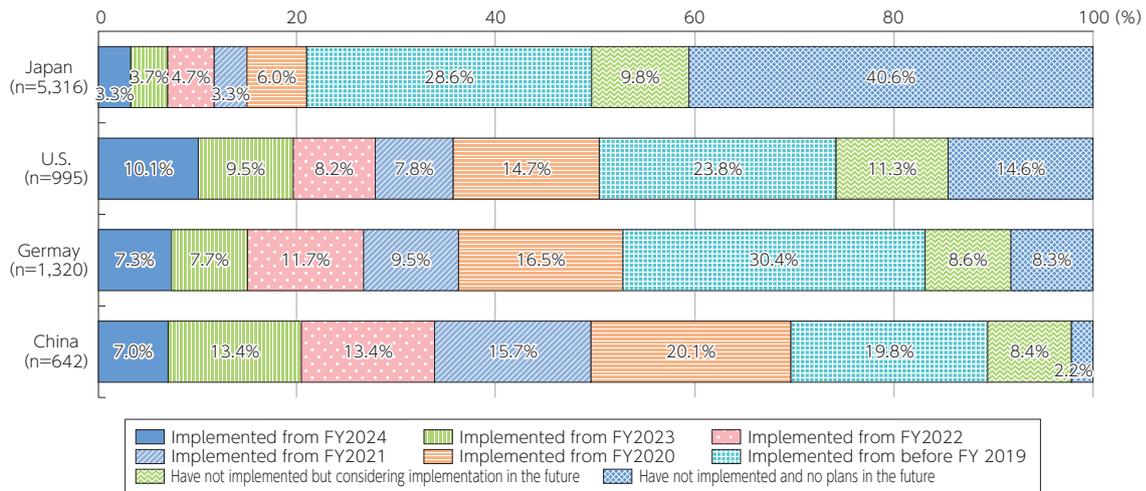
A survey was conducted on the efforts toward digitalization among companies in Japan, the U.S., Germany, and China. After excluding those who responded with "Do not know,"¹¹ it was found that in Japan, the proportion of companies that had not implemented digitalization efforts (combining "Have not implemented but considering implementation in the future" at 9.8% and "Have not implemented and no plans in the future" at 40.6%) was approximately 50%, indicating a delay in promoting digitalization compared with overseas. When looking at the efforts by company size in Japan, it was observed that about 25% of large companies and about 70% of small and medium-sized enterprises responded with "Have not implemented," indicating that there are differences in the status of digitalization efforts depending on the

company size (Figure 2-1-11-18).

In Japanese companies, while there are many comprehensive efforts in digitalizing new ways of working (such as telework) and improving/reforming business processes (such as optimizing business flows with ERP), there are fewer comprehensive digitalization efforts in creating new businesses or creating and improving customer experiences. In Japanese companies, there is a tendency to focus more on defensive digitalization rather than proactive digitalization. In contrast, in the U.S. companies, there is a trend of comprehensive efforts toward new business creation, but partial efforts at the departmental level to create and improve customer experiences (Figure 2-1-11-19).

¹¹ The data were compiled based on the screening data collected until the number of samples for this study was secured.

Figure 2-1-11-18 Status of initiatives to promote digitalization (comparison by country)



* Based on screening research results to extract companies which are taking on digitalization.

(Source) MIC (2025) "Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally"



Figure (related data) Status of digitalization (Japan: comparison by company size)
 Source: MIC (2025) "Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally"
 URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00327>
 (Data collection)

Figure 2-1-11-19 Detailed initiatives to promote digitalization (comparison by country)



(Source) MIC (2025) "Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally"

B Effects of digitalization

Regarding the effects of digitalization in terms of “Creating New Business,” “Improving/enhancing Customer Experiences,” “Adding High Value to Existing Products/services,” “Creating/improving Business Processes,” “Streamlining Operations,” and “Realizing New

Ways of Working,” it was found that in Japan, the proportion of responses indicating “Exceeding Expectations” was the lowest across all aspects, and the proportion of responses indicating “Not Achieving the Expected Effects” was the highest among the four countries.



Figure (related data) Effects of digitalization

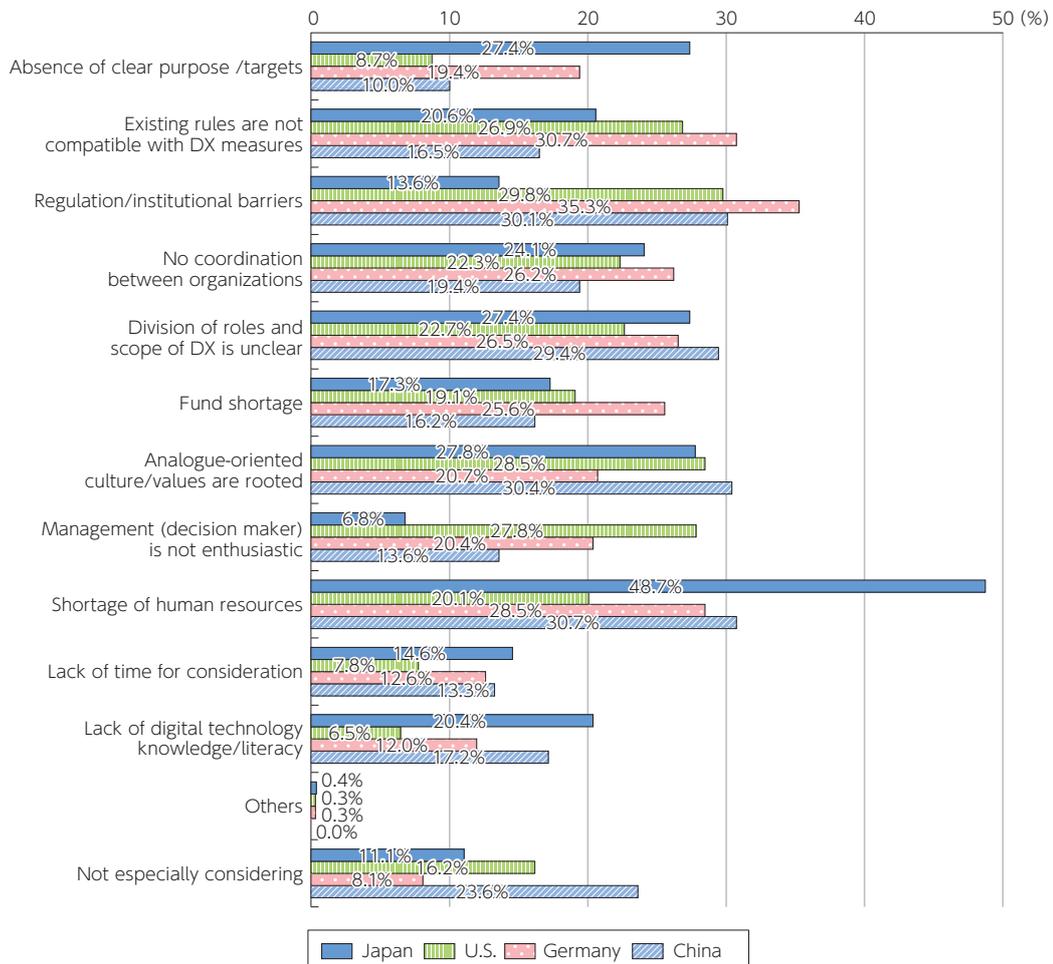
Source: MIC (2025) “Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally”
 URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#00329>
 (Data collection)

C Challenges in digitalization

In terms of challenges and barriers currently recognized or anticipated in digitalization, Japanese companies had the highest response rate for “Insufficient human resources (48.7%),” which was overwhelmingly higher compared with companies in other countries.

This was followed by “Analogue-oriented culture/values are rooted (27.8%),” “Division of roles and scope of DX is unclear (27.4%),” and “Absence of clear purpose /targets (27.4%)” (Figure 2-1-11-20).

Figure 2-1-11-20 Challenges and barriers currently recognized or anticipated in digitalization (comparison by country)

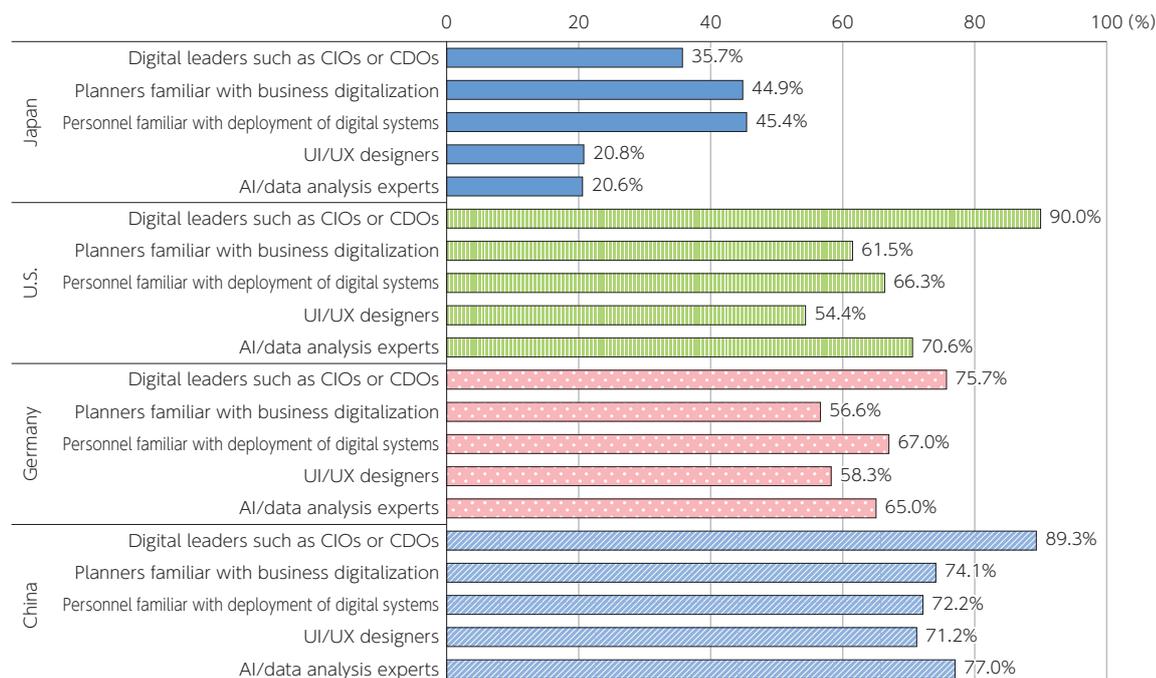


(Source) MIC (2025) “Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally”

Particularly notable in Japanese companies is the scarcity of UI/UX designers and AI/digital analytics specialists compared with other countries. The proportion of companies indicating the “Presence of UI/UX designers” was 20.8% in Japan, while it was approximate-

ly 55-70% in other countries. Similarly, the proportion of companies indicating the “Presence of AI/digital analytics specialists” was 20.6% in Japan, while it was approximately 65-80% in other countries (Figure 2-1-11-21).

Figure 2-1-11-21 Status of specialized digital human resources



(Source) MIC (2025) "Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally"



Figure (related data) Initiatives to secure digital human resources (comparison by country)

Source: MIC (2025) "Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally"

URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00332>

(Data collection)

Furthermore, when asked about the status of internal system development, it was found that in Japan, 35.7% of companies responded that they conduct system development under their own leadership ("almost all development is carried out by in-house engineers" and "mainly

developed by in-house engineers, with some development outsourced to external vendors"). In contrast, overseas, approximately 80-90% of companies reported that they conduct system development under their own leadership, showing a significant difference from Japan.



Figure (related data) In-house development of systems (comparison by country)

Source: MIC (2025) "Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally"

URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00333>

(Data collection)

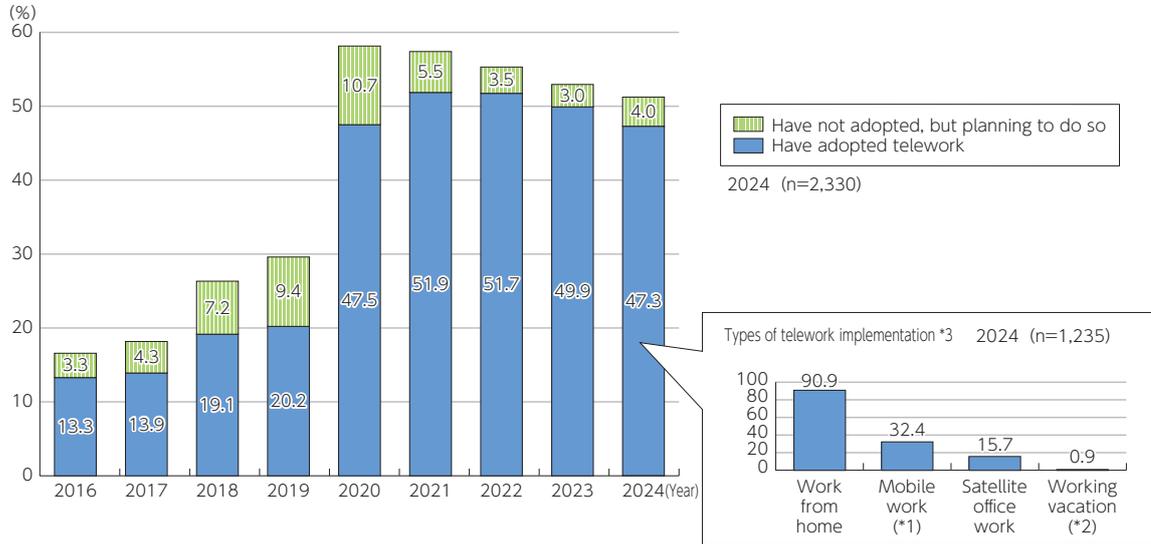
(2) Telework and online meetings

A Adoption of telework in Japanese companies

The adoption of telework in private companies rapidly progressed after the spread of COVID-19 in 2020, however, it has been on a declining trend since 2022.

According to the 2024 Communication Usage Trend Survey conducted by the MIC, about 47.3% of companies have adopted telework (Figure 2-1-11-22).

Figure 2-1-11-22 Changes in the adoption rate of telework



*1 Working outside of the office for sales activities and other similar work, including work such as checking email and writing daily reports during commutes or at locations such as cafes.

*2 Telework performed in a location other than the usual workplace or the home, while also spending time for personal matters.

*3 The total includes entities that provided no response to adoption type.

(Source) MIC "Communications Usage Trend Survey"



Figure (related data) Purpose of adopting of telework (multiple answers allowed)

Source: MIC "Communications Usage Trend Survey"

URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00338>

(Data collection)



Figure (related data) Reasons for not adopting telework (time series)

Source: MIC "Communications Usage Trend Survey"

URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00339>

(Data collection)

B Utilization of telework and online meetings (individual and international comparison)

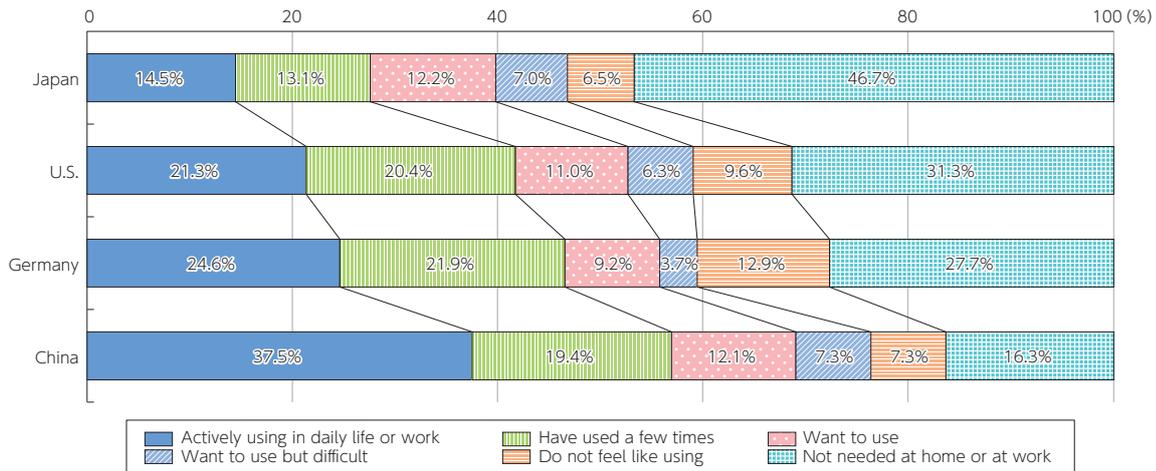
A survey was conducted among citizens of Japan, the U.S., China, and Germany regarding the utilization of telework and online meetings (hereinafter referred to as "telework, etc.>").

The percentage of respondents who answered that they "use telework, etc. actively in their daily life and work" slightly decreased compared with the previous year in the three countries other than Japan, suggesting that this may be due to the social trend of people returning to offices (Figure 2-1-11-23). In Japan, the most common reason cited for the difficulty in implementing telework, etc. was the "lack of services they want to use

in the company" at 36.0%.

When examining the utilization of telework, etc. in Japan by age group, the highest utilization was among those in their 40s, followed by those in their 20s and 30s, with 32.0% in their 40s. Additionally, a high percentage of respondents in their 20s expressed that they "want to use telework, etc. in the future," indicating their strong willingness to use telework, etc. On the other hand, the percentage of respondents who answered that telework, etc. is "not necessary in their daily life and work" increased with age, with 37.4% in their 20s and 59.7% in their 60s (Figure 2-1-11-24).

Figure 2-1-11-23 Usage of telework and online meetings (international comparison)



(Source) MIC (2025) "Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally"

Figure 2-1-11-24 Usage of telework and online meetings (Japan, by age)



(Source) MIC (2025) "Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally"



Figure (related data) Reasons why people don't use telework or online meetings

Source: MIC (2025) "Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally"

URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00342>

(Data collection)

3. Trends in digital usage in administration

(1) Usage of electronic administrative services (electronic applications, electronic tax filing, electronic notifications)

Regarding the usage of electronic administrative services (electronic applications, electronic tax filing, electronic notifications), about 41% of people in Japan had used these services, which was roughly at the same level as in the previous survey (approximately 41%)¹². It

was also roughly the same as the usage level in the U.S. (Figure 2-1-11-25). The main reasons for not using these services included "security concerns," "not knowing how to use the services, devices and applications required for these services," and "lack of desired ser-

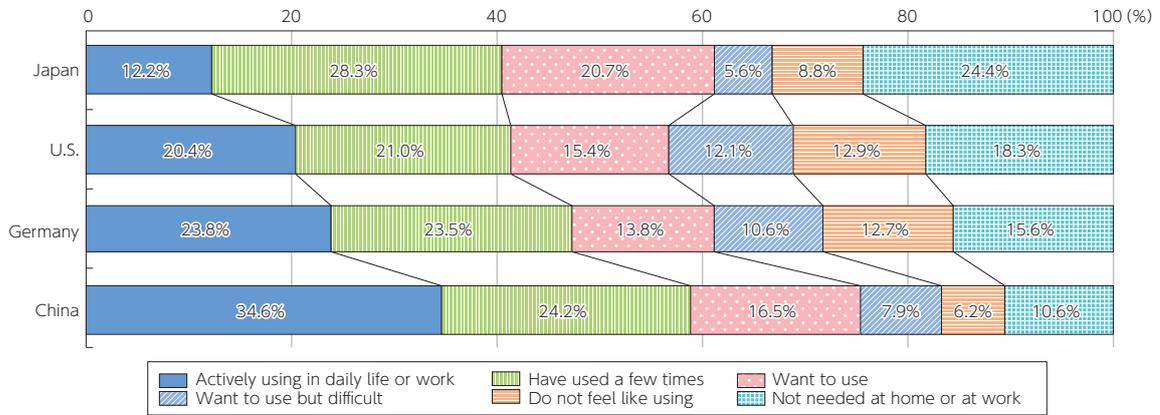
¹² The 2024 White Paper on Information and Communications in Japan. MIC (2024) "Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally"

vices.”

When examining the usage of electronic administrative services in Japan by age group, the percentage of

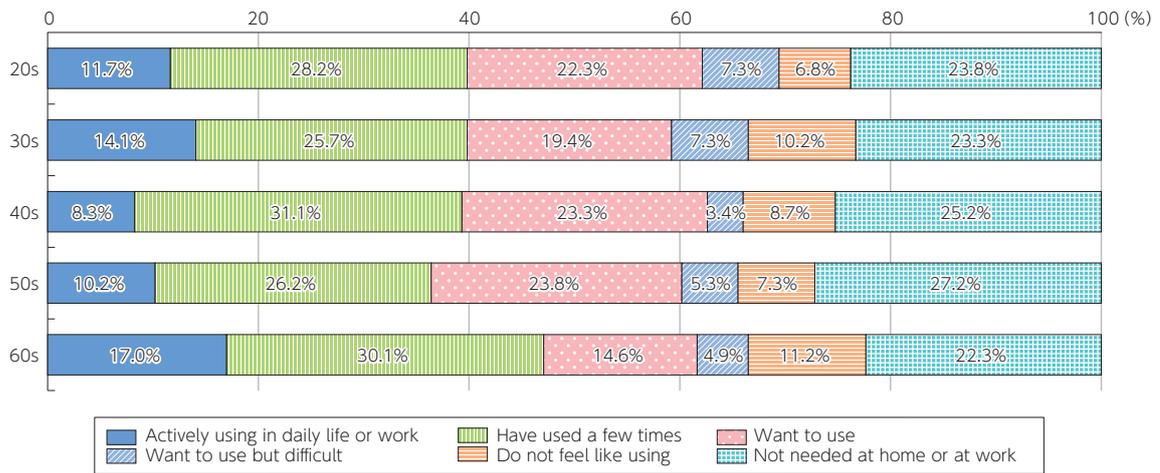
people who have used these services was relatively high among those in their 60s compared with other age groups. (Figure 2-1-11-26).

Figure 2-1-11-25 Usage of digital administrative services (by country)



(Source) MIC (2025) “Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally”

Figure 2-1-11-26 Usage of digital administrative services (Japan, by age)



(Source) MIC (2025) “Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally”



Figure (related data) Reasons why people do not use public digital services (by country)

Source: MIC (2025) “Research and study on the latest trends in information and communication technology research and development, as well as digital utilization, both domestically and internationally”
 URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00345>
 (Data collection)

(2) Promotion of digital government in Japan

A International indicators

Below is an overview of Japan’s position in the world regarding digitalization in the public sector based on in-

ternational indicators.

(A) United Nations Department of Economic and Social Affairs (UNDESA) “World E-Government Ranking”

The UNDESA e-government survey aims to improve transparency and accountability in public policy through ICT and promote citizens’ participation in public policy in the UN member states. It has been conducted since 2003 and biennially since 2008. The survey ranks countries based on the average of three indicators: Online Service Index, Human Capital Index, and Telecommunications Infrastructure Index, to calculate the E-Govern-

ment Development Index (EGDI).

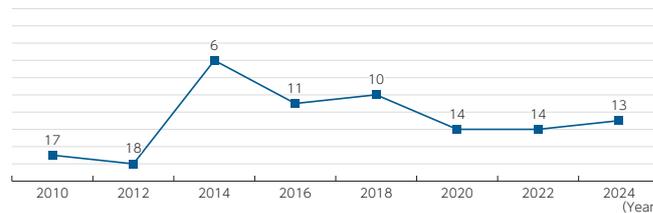
In the 2024 World E-Government Ranking, Denmark continued to rank first as it did in the previous survey (2022), followed by Estonia, Singapore, the Republic of Korea, and Iceland. Japan ranked 13th, up one rank from the previous survey (2022), and its score also increased since the previous survey (Figure 2-1-11-27).

For individual indicators, Japan’s scores improved in

all indicators: Online Service Index (0.9094→0.9427), Human Capital Index (0.8765→0.9117), and Telecom-

munications Infrastructure Index (0.9147→0.9509).

Figure 2-1-11-27 Changes in Japan's ranking in the UN (UNDESA) "World E-Government Ranking"



(Source) UN E-Government Surveys

(B) Waseda University "World Digital Government Ranking"

The Waseda University Institute of e-Government has been publishing the "World Digital Government Ranking" annually since 2005, evaluating the progress of digital government promotion in 66 ICT-advanced countries from multiple perspectives, using 10 main indicators (35 sub-indicators). The top five countries were Singapore, the UK, Denmark, the U.S., and the Republic of Korea. Denmark, which had held the top spot for three consecutive years, fell to third place, while Singapore returned to the top spot for the first time in seven years. In the last

year's survey, Japan fell out of the top 10 for the first time since the survey began, and it remained in 11th place this year. In light of Japan's declining birthrate, aging population, and declining population, the following issues were pointed out as actions that should be taken now: reducing administrative and financial costs and improving efficiency by promoting public-private partnerships and innovation through the use of digital technology, and making proactive and optimal investments in digitalization.



Figure (related data) Changes of the rank of Japan in Waseda University "World Digital Government Ranking"

Source: Institute of Digital Government in Waseda University
 URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00347>
 (Data collection)

B Development of data linkage and authentication infrastructure

(A) My Number Card

As of the end of February 2025, the number of My Number Cards held by the population (calculated by subtracting cards abolished due to death or expiration from the total number issued) reached 78.0%. As of the end of January 2025, approximately 81.53 million cards were registered in total as health insurance cards, with a registration rate of 84.1% relative to the total number of

issued My Number Cards. Regarding the registration of public money receiving accounts, as of the end of January 2025, the cumulative number of registrations was approximately 63.46 million, with a registration rate of 65.5% relative to the total number of issued My Number Cards.



Figure (related data) Changes in the status of adoption of My Number Card

Source: Prepared based on MIC "The Status of Issuance of My Number Card"
 URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00348>
 (Data collection)



Figure (related data) Changes in the registration status of My Number Card as health insurance cards

Source: Prepared based on Digital Agency "Dashboard on the adoption of My Number Card" (data obtained on January 31, 2025)
 URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00349>
 (Data collection)



Figure (related data) Changes in public fund receipt account registrations of My Number Card

Source: Prepared based on Digital Agency "Dashboard on the adoption of My Number Card" (data obtained on January 31, 2025)
 URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00350>
 (Data collection)

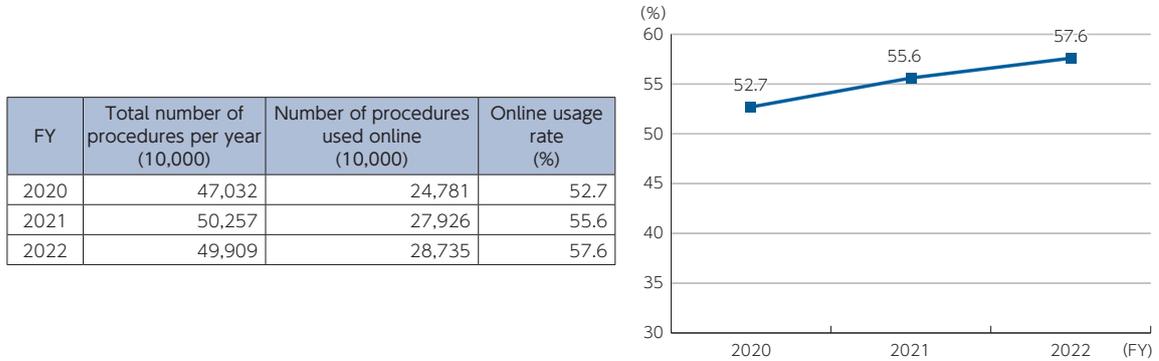
C Digitalization efforts in local governments

(A) Current status of online procedures

Online usage of procedures that local governments should prioritize for online implementation under the

“Priority Plan for Realizing a Digital Society” is as follows (Figure 2-1-11-28).

Figure 2-1-11-28 Changes in the online usage of procedures that local governments should prioritize for digitalization



*1 Online usage for FY2020 was calculated based on a resurvey of the 59 procedures that local governments should prioritize for online implementation as listed in the “Priority Policy Program for Realizing Digital Society” (approved by the Cabinet on June 7, 2022). From FY2021 onwards, the survey continues to conduct the survey on the procedures that local governments should prioritize for online implementation as listed in the “Priority Policy Program for Realizing Digital Society.”

*2 Online usage rate (%) = Number of procedures used online / total number of procedures per year × 100

The total number of procedures per year is a national estimate based on the total number of procedures and the population for organizations that have already gone online for these procedures.

The number of procedures used online is estimated in the same way as the total number of procedures per year, in order to more precisely calculate the online usage rate.

(Source) Prepared based on MIC “Overview of Promotion of DX and Use of Information by Local Governments: Summary of FY2023 Survey on Promotion of Use of Administrative Information by Local Governments”¹³

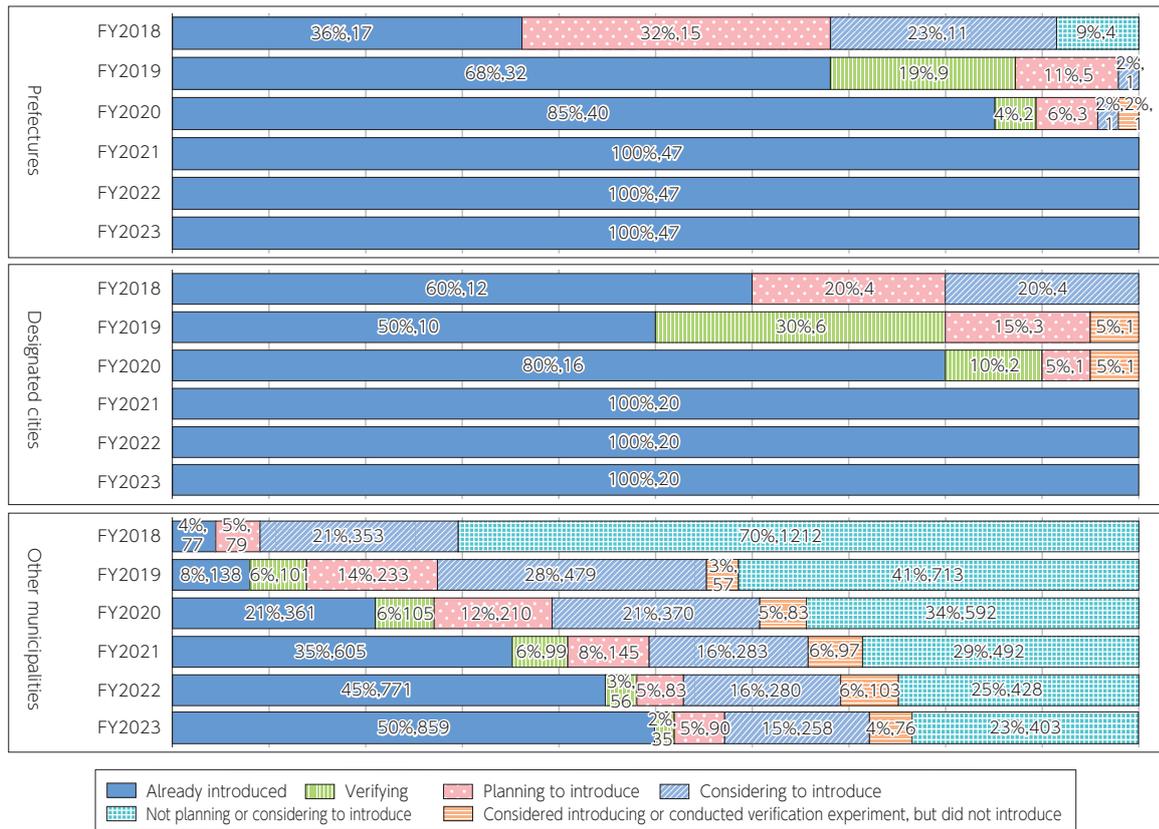
(B) Promotion of AI and RPA utilization

As of FY2021, 100% of prefectures and designated cities had introduced AI. Among other municipalities, 50% had introduced AI as of FY2023, and including those in the process of verification, planning to introduce, or considering to introduce, about 72% of local governments are working towards AI introduction (Figure 2-1-11-

29). By function, the three functions of voice recognition, character recognition, and chatbot responses have been introduced at the highest rates across prefectures, designated cities, and other municipalities. Other functions, although still small in number, have continued to increase.

¹³ https://www.soumu.go.jp/denshijiti/060213_02.html

Figure 2-1-11-29 Status of introduction of AI in local governments



(Source) MIC “Promotion of Utilization of AI and RPA in Local Governments”¹⁴



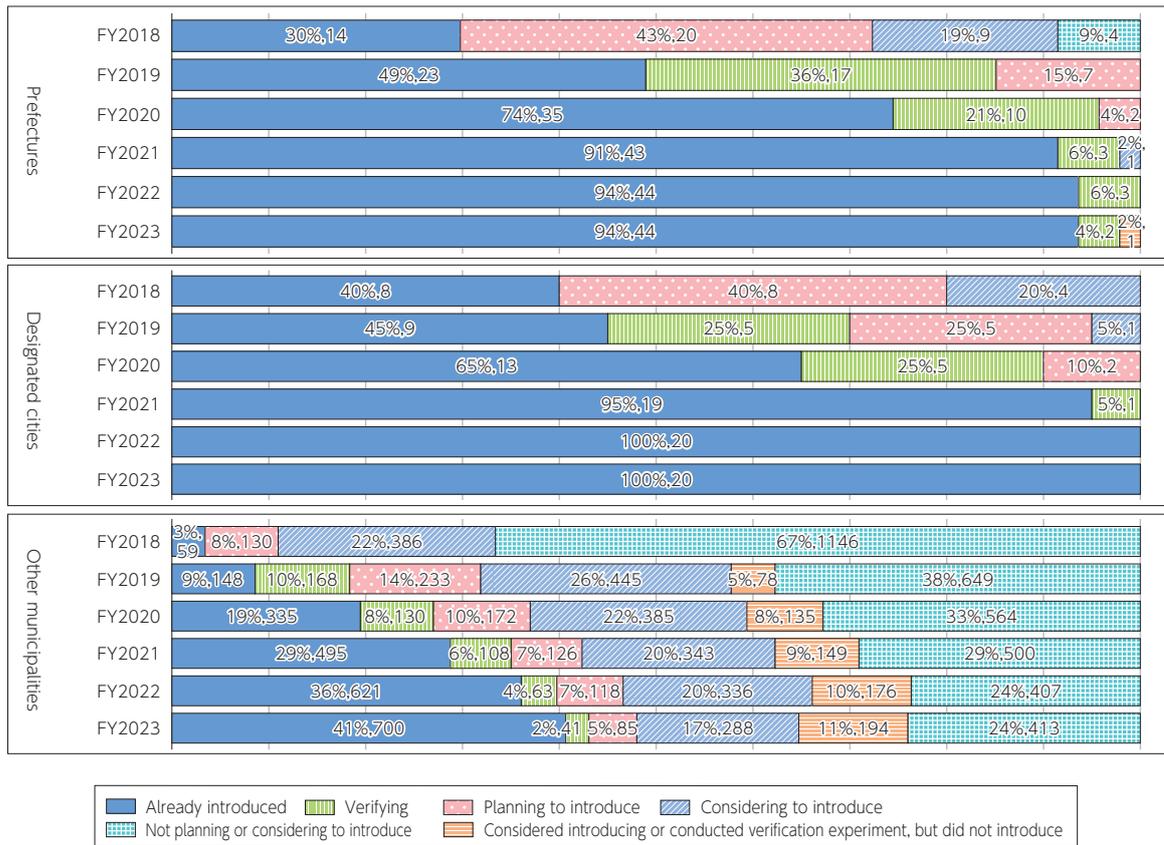
Figure (related data) Status of introduction of AI in local governments (by AI function)
 Source: MIC “Promotion of Utilization of AI and RPA in Local Governments”
 URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00353>
 (Data collection)

Additionally, the number of organizations that had introduced RPA increased to 94% for prefectures and 100% for designated cities as of FY2023. For other municipalities, the introduction rate stood at 41%, but when including those in the process of verification, planning to introduce, or considering to introduce, approximately 65% of

local governments are working towards RPA adoption (Figure 2-1-11-30). By sector, RPA was most commonly introduced in “Finance, Accounting, and Treasury,” followed by “Child Welfare and Childcare,” “Health and Medical Care,” and “Organization and Personnel (including administrative reforms).”

¹⁴ https://www.soumu.go.jp/main_content/000934146.pdf

Figure 2-1-11-30 Status of introduction of RPA in local governments



(Source) MIC "Promotion of Utilization of AI and RPA in Local Governments"¹⁵



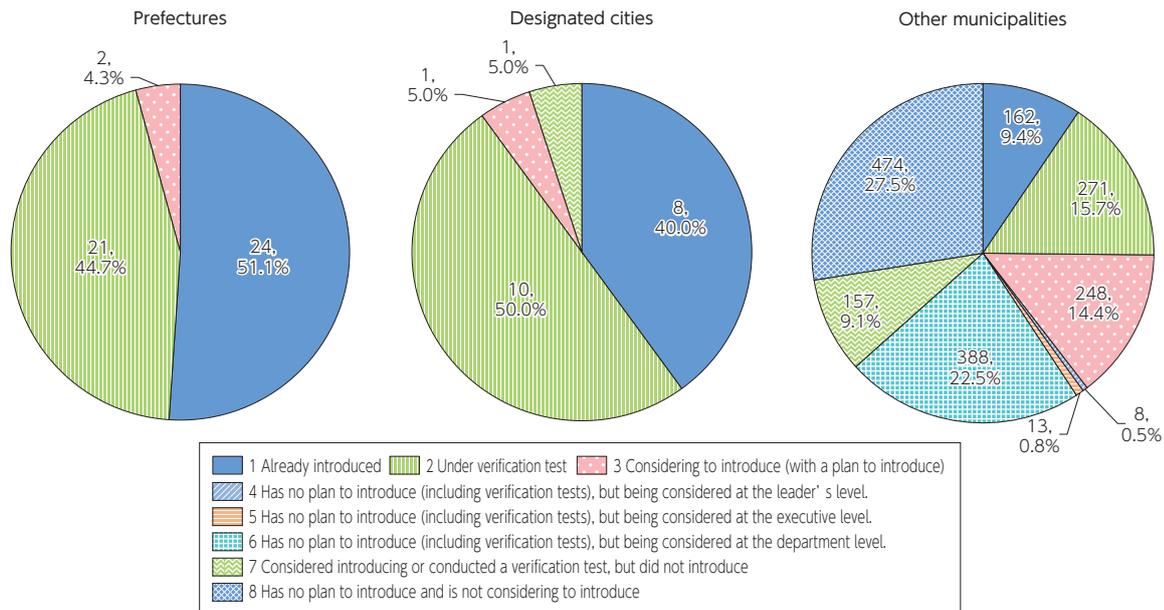
Figure (related data) Status of introduction of RPA in local governments (by RPA field)
 Source: MIC "Promotion of Utilization of AI and RPA in Local Governments"
 URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/datashu.html#f00355>
 (Data collection)

As of the end of 2023, 51.1% of prefectures, 40.0% of designated cities, and 9.4% of other municipalities had

introduced generative AI (Figure 2-1-11-31).

¹⁵ https://www.soumu.go.jp/main_content/000934146.pdf

Figure 2-1-11-31 Status of introduction of generative AI in local governments (as of December 31, 2023)



(Source) MIC "Introduction of Generative AI in Local Governments"¹⁶



Figure (related data) Examples of generative AI introduction in local governments (Including Verification Tests) (as of December 31, 2023)
 Source: MIC "Introduction of Generative AI in Local Governments"
 URL: <https://www.soumu.go.jp/johotsusintokei/whitepaper/ja/r07/html/dashu.html#f00357>
 (Data collection)

(C) Status of telework implementation for staff

As of October 2024, all prefectures and designated cities had implemented telework. Among municipalities, the implementation rate was 61.4% as of October 2024, versus 60.1% as of October 2023 (Figure 2-1-11-32).

Organizations that had introduced telework identified the following significance and benefits: improvement of the work-life balance of employees; realization of flexible

and diverse working styles; effective use of time; and infection control measures. On the other hand, organizations that had not introduced telework cited the following reasons: many employees are engaged in front-line and field work that is not suited for teleworking; it is costly to introduce telework; and it is difficult to manage employee labor.

Figure 2-1-11-32 Status of telework implementation for staff



(Source) Prepared based on MIC "Survey on Telework Initiatives by Local Governments"¹⁷

¹⁶ https://www.soumu.go.jp/main_content/000956953.pdf

¹⁷ MIC "Survey on Telework Initiatives by Local Governments" (October 1, 2019, October 1, 2020, October 1, 2021, October 1, 2022, October 1, 2023, October 1, 2024) (https://www.soumu.go.jp/main_content/001005074.pdf)

Column Digital Utilization Trends in the 2024 Noto Peninsula Earthquake

1. Survey on ICT usage in the disaster-affected areas of the 2024 Noto Peninsula Earthquake

From November 2024 to March 2025, the MIC conducted a survey of affected people (on an individual basis)¹ and interviews with local governments, etc. (on an organization basis)² (hereinafter referred to as the “Survey of Disaster-Affected Areas”) to clarify how information and communication tools were utilized, as well as related issue, among residents of the disaster-affected areas as well as local governments, businesses, and organizations, etc. involved in the disaster response and reconstruction efforts following the earthquake that

struck the Noto region of Ishikawa Prefecture in January 2024 (hereinafter referred to as the “Noto Peninsula Earthquake”). The results were compared with those of the survey on the Kumamoto Earthquake that occurred in April 2016³ and a nationwide survey on the Noto Peninsula Earthquake conducted in March 2024 (hereinafter referred to as the “Nationwide Survey”)⁴ to analyze the characteristics of ICT usage and related issues in the disaster-affected areas of the Noto Peninsula Earthquake.

2. Use of ICT media immediately after the earthquake

Compared with the methods used to gather information and confirm people’s safety immediately after the main shock of the Kumamoto Earthquake that occurred on April 16, 2016 (during the first few hours after the earthquake), the use of mobile phones, mobile email, and AM radio decreased, while the use of terrestrial broadcasting (television) showed a high percentage of usage (**Figure 1**). One possible reason for the high usage of terrestrial broadcasting during the Noto Peninsula Earthquake is that while the main shock of the Kumamoto Earthquake occurred at around 1:30 a.m., the Noto Peninsula Earthquake struck at around 4:00 p.m.

on New Year’s Day. Therefore, it is possible that a higher percentage of people were watching television just before the earthquake, or were able to turn it on immediately after the earthquake, compared with the Kumamoto Earthquake. Furthermore, there was an overall increase in the use of Internet-based services, such as disaster-prevention apps, Internet-based safety confirmation services, and social media platforms such as X (formerly Twitter). This suggests that, with the widespread use of smartphones and other digital tools, people used a wide range of methods to gather information and confirm people’s safety via the Internet.

¹ Survey Period: November 2024 – February 2025

Method: A web-based survey was conducted for individuals registered as web survey participants, as well as a survey for those who had agreed to participate in interviews.

Respondents: Individuals who resided in the following areas at the time of the Noto Peninsula Earthquake, as well as those who were staying in Area A, which suffered particularly severe damage (a total of 1,092 people).

Area A: Anamizu Town, Uchinada Town, Shika Town, Suzu City, Nanao City, Noto Town, and Wajima City in Ishikawa Prefecture, and Himi City in Toyama Prefecture

Area B: Kanazawa City, Nakanoto Town, and Hakui City

Area C: Kaga City, Kahoku City, Komatsu City, Tsubata Town, Nomi City, and Hodatsushimizu Town

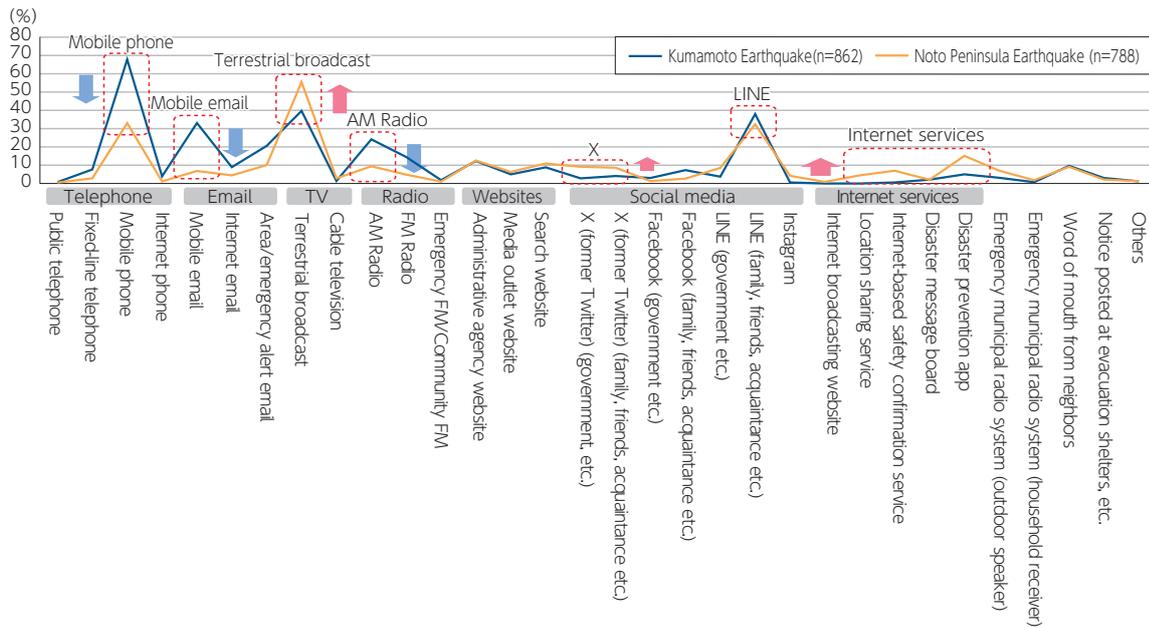
² Survey Period: December 2024 – March 2025

Respondents: Interviews were conducted with 57 organizations, including local governments in Ishikawa Prefecture that suffered particularly severe damage from the Noto Peninsula Earthquake, as well as local governments, businesses, hospitals, agricultural and fishery cooperatives, commerce and industry associations, and non-profit organizations located in Kanazawa City, which accepted a large number of secondary evacuees and served as a hub for external support and disaster response activities.

³ MIC Press Release (April 13, 2017) “Survey Results on the State of Information and Communications in the Kumamoto Earthquake” (https://www.soumu.go.jp/menu_news/s-news/01tsushin02_02000108.html)

⁴ A nationwide web-based survey was conducted for registered participants in March 2024. Responses were evenly distributed by gender (male/female) and age group (20s, 30s, 40s, 50s, and 60s and above), and a total of 2,060 responses were received.

Figure 1: Methods used immediately after the earthquake (multiple answers allowed)



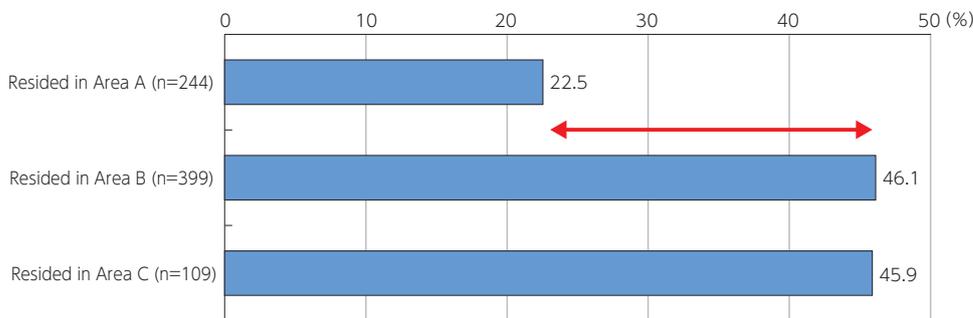
(Source) MIC "Survey on Digital Utilization Trends in the 2024 Noto Peninsula Earthquake"

3. Usage rate of television broadcasting by area of residence

Looking at the percentage of people who first used television broadcasting⁵ immediately after the earthquake by area of their residence, the figure was 22.5% for people who lived in areas that suffered particularly severe damage (Anamizu Town, Uchinada Town, Shika Town, Suzu City, Nanao City, Noto Town, and Wajima City in Ishikawa Prefecture, as well as Himi City in Toyama Prefecture; hereinafter referred to as "Area A"). This was significantly lower than the corresponding percentage (approximately 45%) observed in other surveyed areas (Areas B and C⁶) (Figure 2). Also, when comparing the percentages of respondents who "considered

television broadcasting to be useful before the earthquake" with those who "actually used television broadcasting at the time of the earthquake" by area, the values for the two options were similar in Areas B and C, whereas the percentage of those who "actually used television broadcasting at the time of the earthquake" was lower in Area A (Figure 3). This suggests that in Area A, where damage from the earthquake was particularly severe, many affected residents were unable to access television broadcasting immediately after the earthquake.

Figure 2: Percentage of respondents who first used television broadcasting (by area of residence)

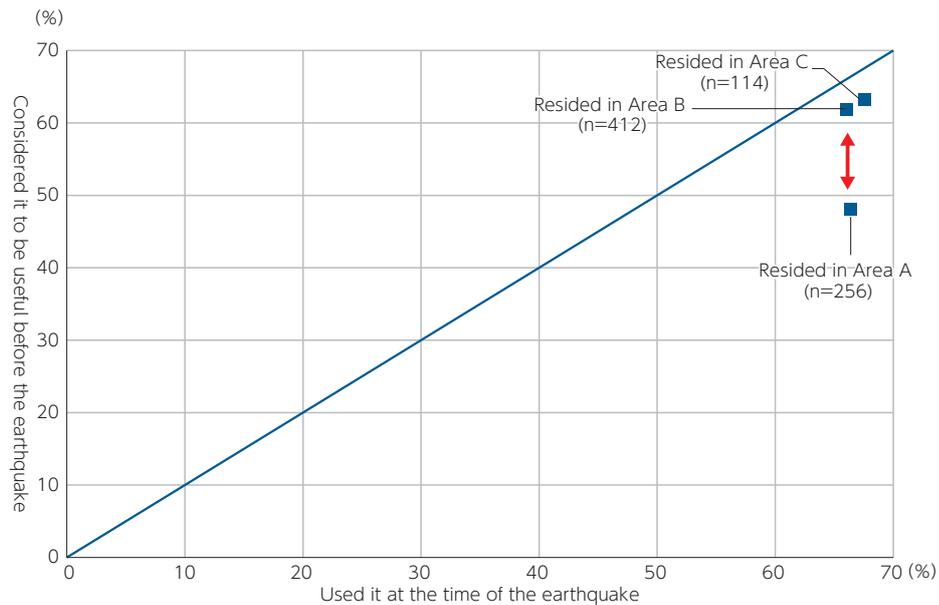


Note: Respondents of these questions are survey respondents who "gathered information and checked the safety of others at the time of the earthquake."
 (Source) MIC "Survey on Digital Utilization Trends in the 2024 Noto Peninsula Earthquake"

⁵ In this context, "television broadcasting" includes terrestrial broadcasting, simulcast streaming of TV programs, catch-up/on-demand streaming of TV programs, satellite broadcasting, and cable television broadcasting. Among the 289 respondents who selected "television broadcasting" in Figure 3, the number of those who selected "catch-up/on-demand streaming of TV programs" was zero, and those selected "simulcast streaming of TV programs" was seven. Together they only account for approximately 2% of the total, indicating that the overwhelming majority of respondents obtained information through conventional "television devices."

⁶ Area B: Kanazawa City, Nakanoto Town, and Hakui City
 Area C: Kaga City, Kahoku City, Komatsu City, Tsubata Town, Nomi City, and Hodatsushimizu Town

Figure 3: Relationship between the percentage of respondents who considered television broadcasting to be useful before the earthquake and the percentage of those who used it at the time of the earthquake (by area of residence)



(Source) MIC "Survey on Digital Utilization Trends in the 2024 Noto Peninsula Earthquake"

The results of the Survey of Disaster-Affected Areas highlight the importance of television broadcasting as an information-gathering tool during disasters for residents of the affected areas. However, the results also suggest that in areas that suffered particularly severe damage, people were unable to obtain information through television broadcasting, although it had been recognized as a useful tool for gathering information during disasters.

During the Noto Peninsula Earthquake, television broadcasts were interrupted due to power outages and disconnections in transmission lines. In order to deliver comprehensive information to affected residents during disasters in a reliable manner, it is necessary to facilitate the provision of disaster-related information through various communication channels and to further strengthen the resilience of broadcast networks.

4. Impact of unverified information posted on social media

With respect to ICT usage during the Noto Peninsula Earthquake and the Kumamoto Earthquake, a major difference between the two is that the use of smartphones and social media had spread across a wide range of generations at the time of the Noto Peninsula Earthquake. The Nationwide Survey confirmed that unverified information was circulated and spread on social media plat-

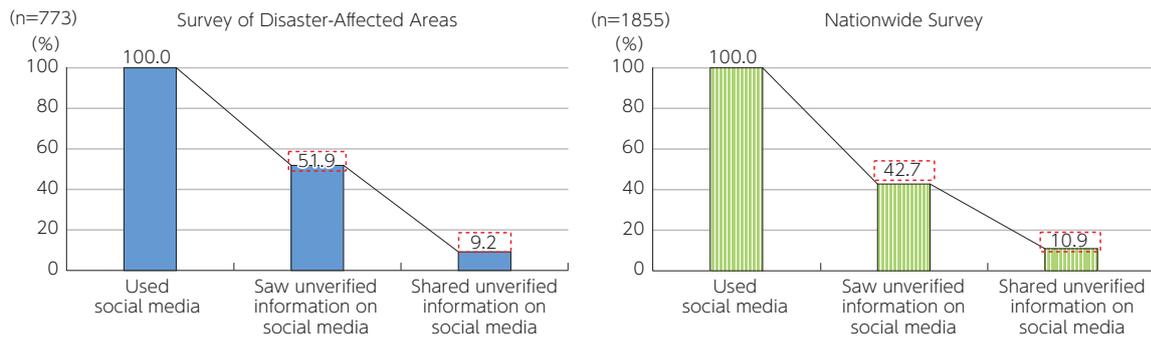
forms, and the Survey of Disaster-Affected Areas also confirmed instances where unverified information was circulated and spread on social media, and that such information affected disaster people in disaster-affected areas, including temporary visitors, as well as on local governments and other organizations.

(1) Awareness and spread of unverified information on social media

51.9% of respondents who used social media encountered unverified information related to the Noto Peninsula Earthquake on social media, and 9.2% of respondents said they had shared the information they saw on social media. Compared with the Nationwide Survey, the percentage of respondents who encountered un-

fied information on social media was higher in the Survey of Disaster-Affected Areas. This suggests that residents of affected areas were more likely to encounter unverified information related to the earthquake on social media (Figure 4).

Figure 4: Awareness and spread of unverified information on social media



Note: Respondents of these questions are survey respondents who “used at least one type of social media”.

(Source) MIC “Survey on Digital Utilization Trends in the 2024 Noto Peninsula Earthquake”

Looking at the percentage of respondents who encountered unverified information by information type and social media platform, X was the highest in both the Survey of Disaster-Affected Areas and the Nationwide Survey, with little difference between the two surveys. However, a notable characteristic of the respondents of the Survey of Disaster-Affected Areas, when compared with those of the Nationwide Survey, was that the overall

percentage of respondents who encountered unverified information on X was relatively lower, while the percentage of those who encountered such information on LINE was higher. In particular, the percentage of respondents who saw posts related to public safety on LINE was significantly higher in the Survey of Disaster-Affected Areas.

(2) Impact of unverified information posted on social media

It was also confirmed through the interviews that there were cases where dis-/mis-information was shared and circulated via LINE in the disaster-affected areas of the Noto Peninsula Earthquake, including through LINE’s open chat function within local community groups. This suggests that while LINE was actively used for information sharing in the disaster-affected areas, it also became a route through which unverified information could easily circulate. Furthermore, the interviews

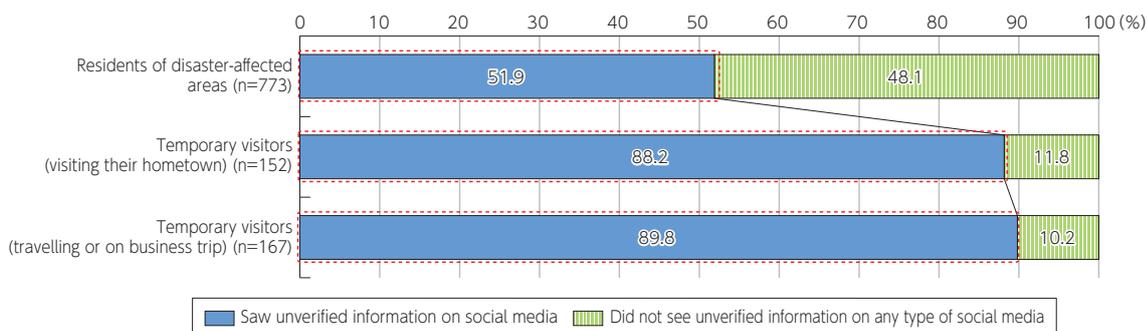
revealed that in areas that suffered particularly severe damage, local governments, etc. received inquiries requesting emergency dispatches based on unverified information on persons in need of rescue that was circulated on social media. However, in many cases, when rescue personnel arrived at the scene, no one was found to be in need of rescue. This shows that unverified information on social media also affected the rescue operations of local governments.

(3) Comparison between residents and temporary visitors in the disaster-affected areas

Given that the earthquake occurred on New Year’s Day, the target of the Survey of Disaster-Affected Areas included not only residents of the disaster-affected areas but also “temporary visitors” in Area A, such as people who were visiting their hometowns for the holidays or travelers in the area. Among social media users, the percentage of those who encountered unverified information was approximately 50% among local residents. On

the other hand, the corresponding percentage among temporary visitors was extremely high at around 90% (Figure 5). By social media platform, both groups most frequently encountered unverified information on X, but among temporary visitors, the percentage of people who encountered such information on LINE was as high as on XLINE was used as frequently as X, indicating a different trend from that of local residents (Figure 6).

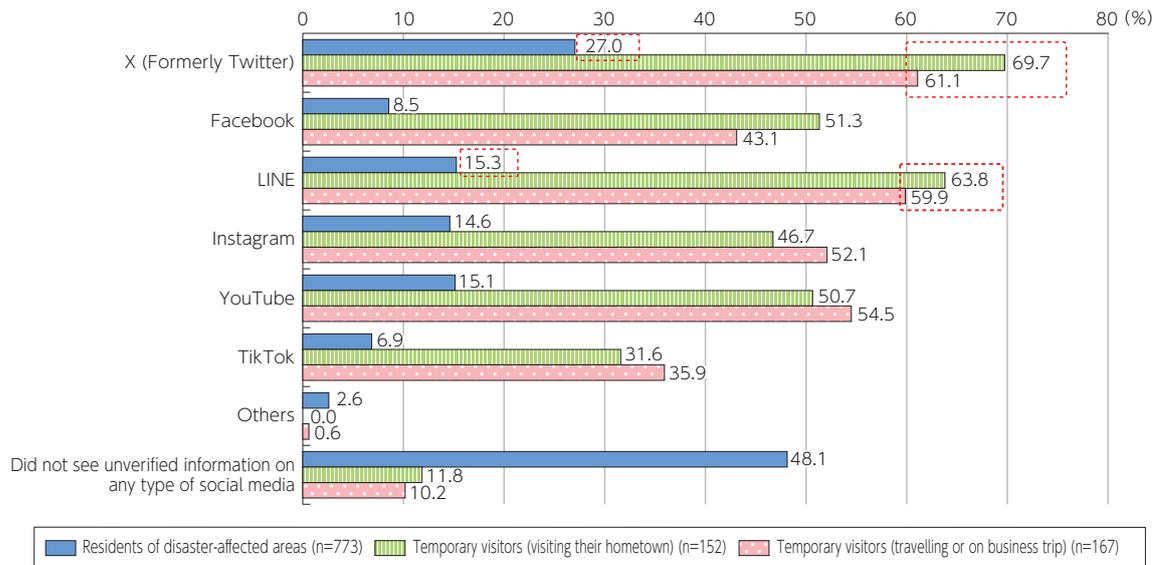
Figure 5: Awareness of unverified information (single answer; by location of residence/visit)



Note: Respondents of these questions are survey respondents who “used at least one type of social media”.

(Source) MIC “Survey on Digital Utilization Trends in the 2024 Noto Peninsula Earthquake”

Figure 6: Awareness of unverified information (multiple answers allowed; by location of residence/visit and type of social media)



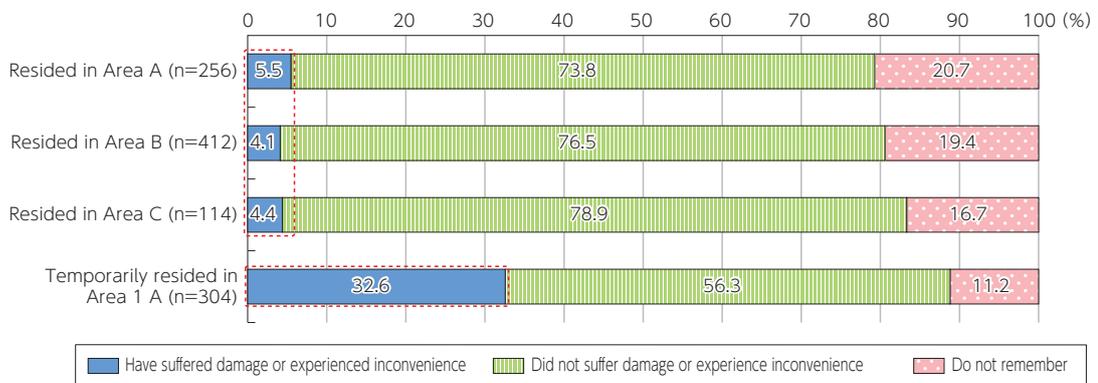
Note: Respondents of these questions are survey respondents who “used at least one type of social media”

(Source) MIC “Survey on Digital Utilization Trends in the 2024 Noto Peninsula Earthquake”

The percentage of respondents who had actually suffered damage or experienced inconvenience from dis-/mis-information related to the earthquake was 32.6% among temporary visitors, compared with about 5% among local residents (Figure 7). Possible reasons for this are: 1) temporary visitors placed greater reliance on

social media as an information source during the disaster, thereby increasing their exposure to dis-/mis-information; and 2) they had difficulty obtaining reliable information because they were unfamiliar with the area, making them more susceptible to unverified information on social media.

Figure 7: Experience of suffering damage or being inconvenienced by dis-/mis-information (single answer; by location of residence/visit)



(Source) MIC “Survey on Digital Utilization Trends in the 2024 Noto Peninsula Earthquake”

The results of this survey confirm that, even in the awareness of affected residents, unverified information was circulated and spread on social media during the Noto Peninsula Earthquake. The results also revealed that the impact of such information was greater on temporary visitors, who tend to have less access to informa-

tion during disasters, and that unverified information also affected the actual rescue operations of local governments, etc. Going forward, addressing dis-/mis-information on social media during disasters remains an important issue.