

# Japan's Economy Beyond Covid-19

## *Challenges for the Monetary Policy*

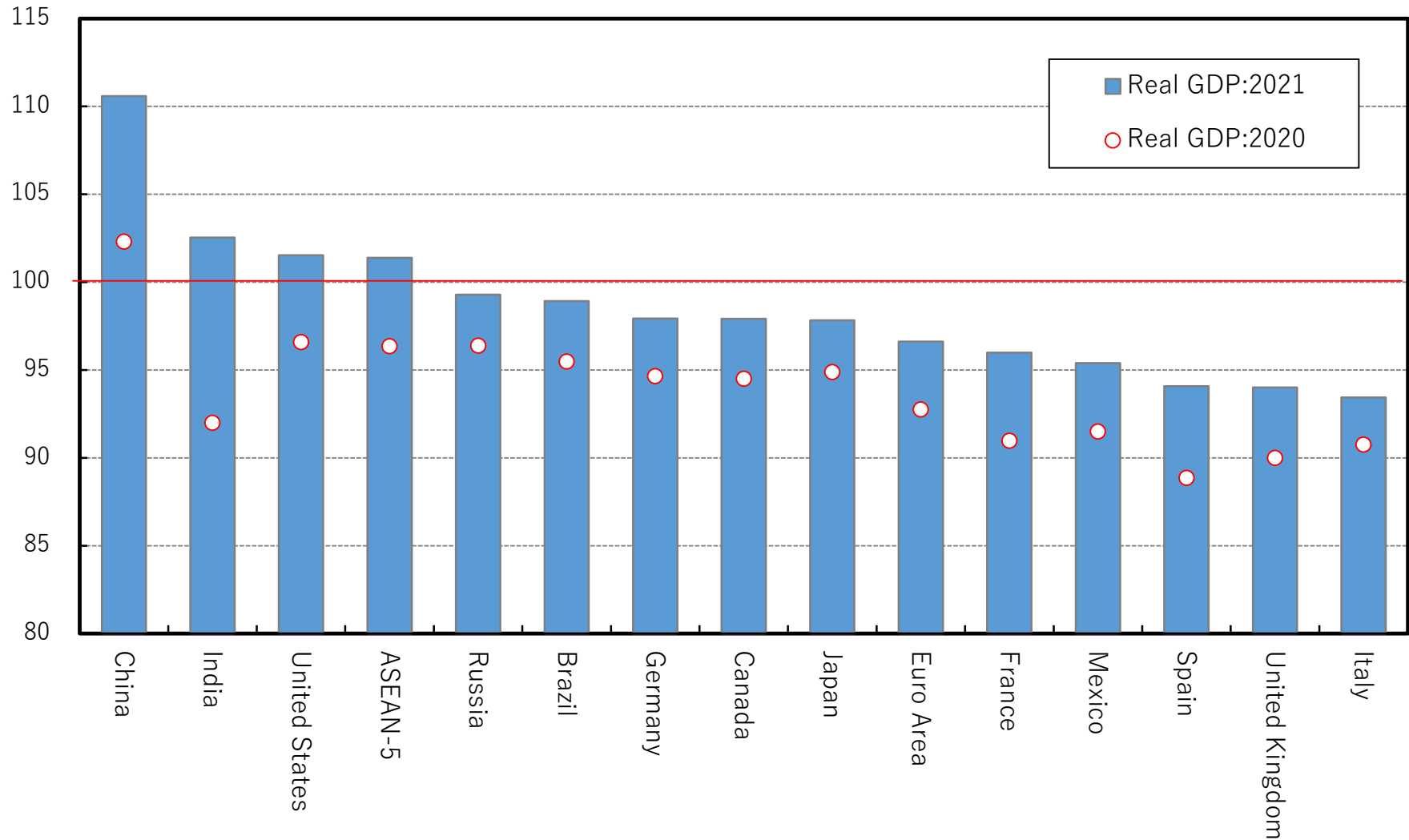
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March 2, 2021

**Hiroshi Nakaso**  
Chairman of the Institute  
Daiwa Institute of Research

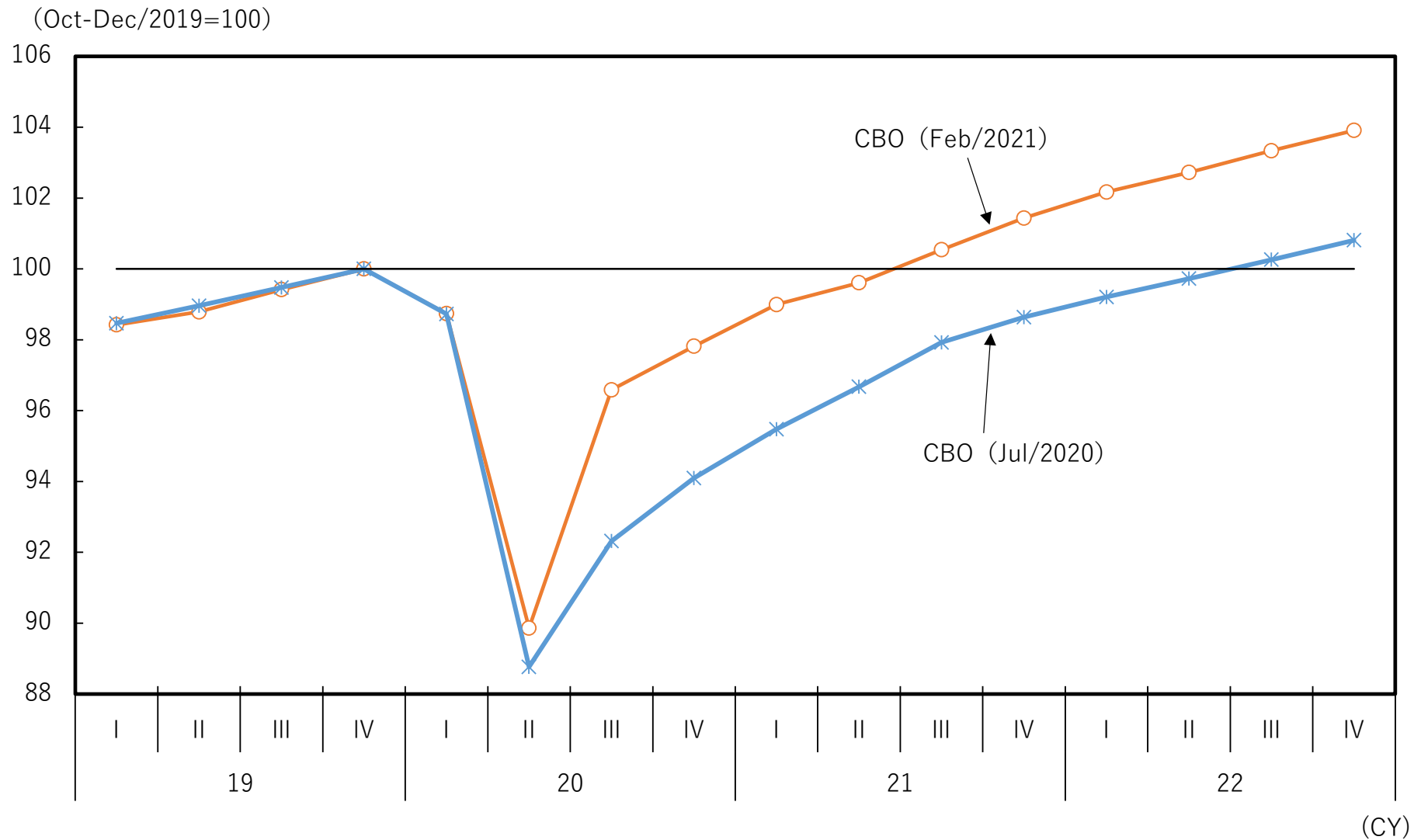
# Overview of the World Economic Outlook Projections (IMF)

(2019 = 100)



Source: IMF World Economic Outlook (Jan 2021); compiled by DIR

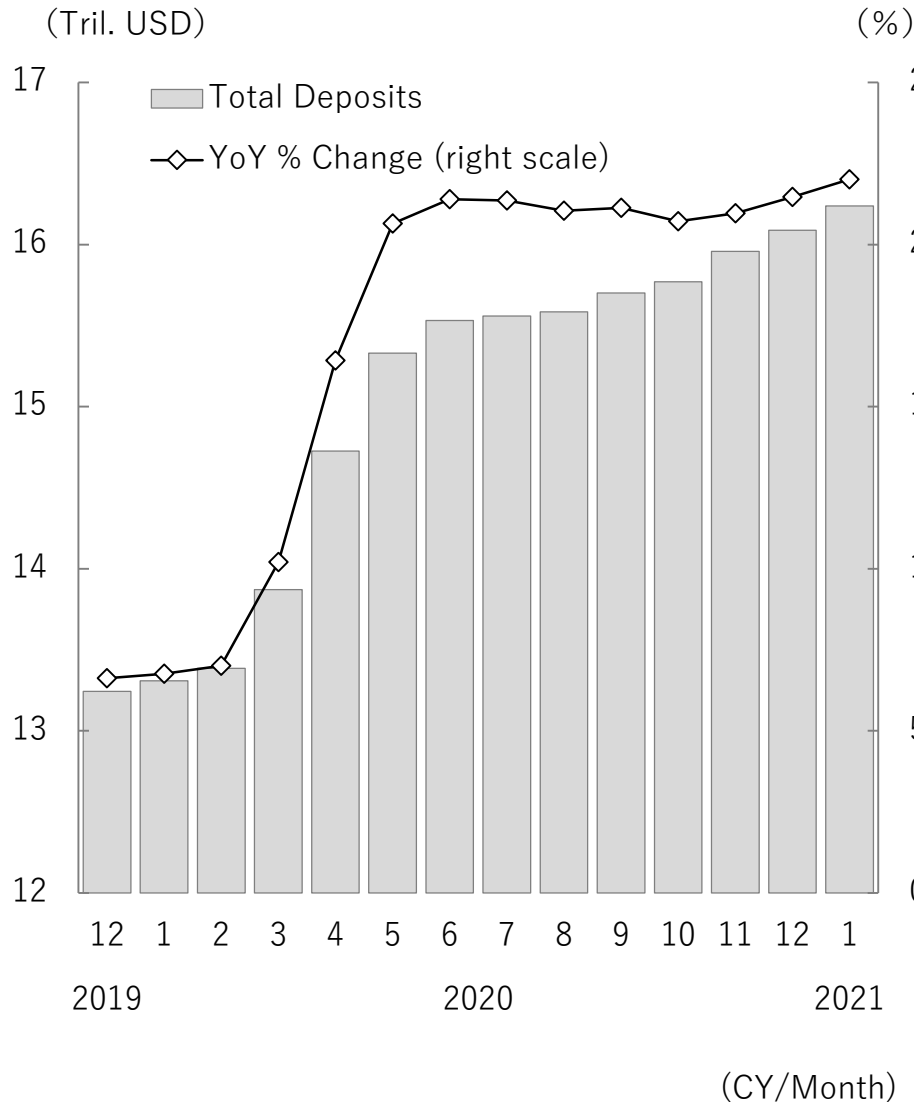
# Update on US Economic Outlook



Source: CBO; compiled by DIR

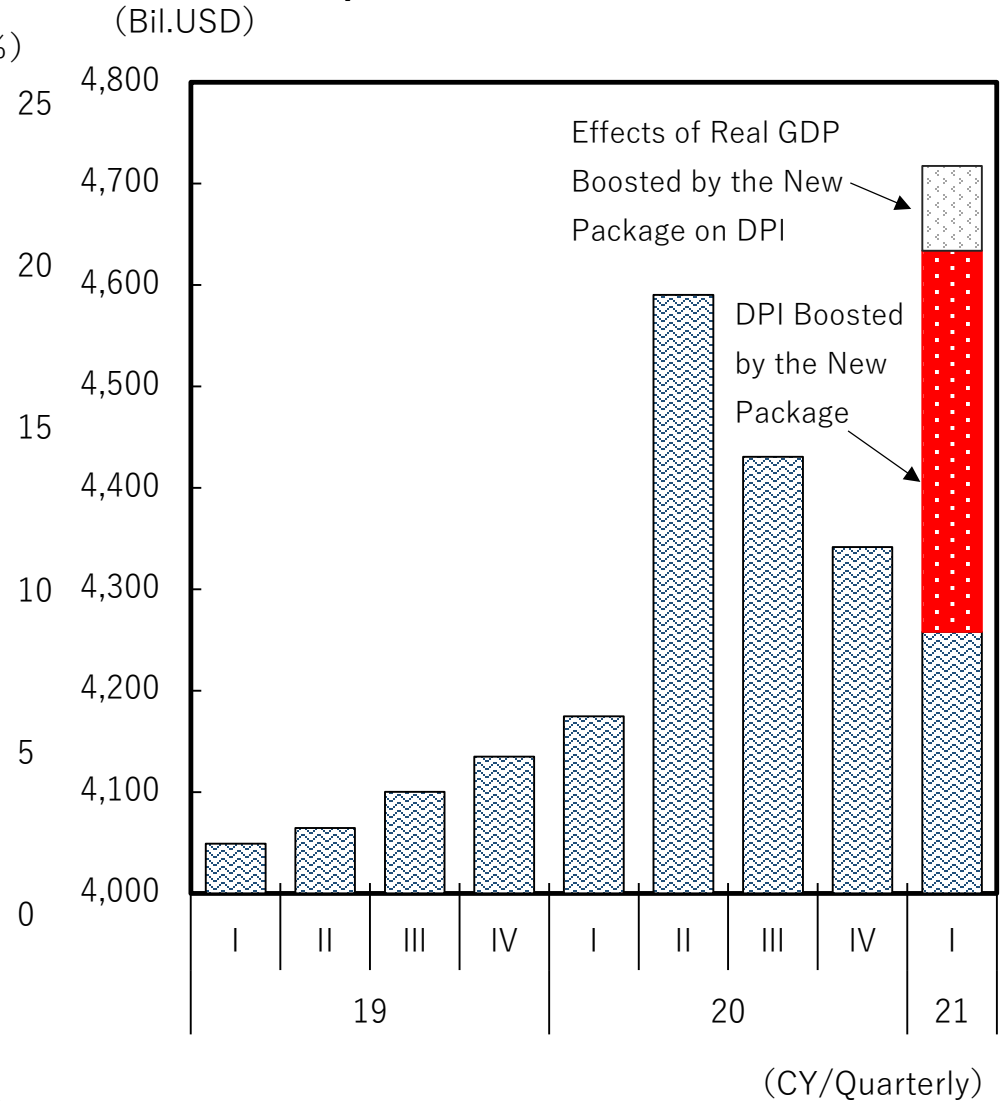
# Possibility of Rising Inflation in the United States

## US Total Deposits



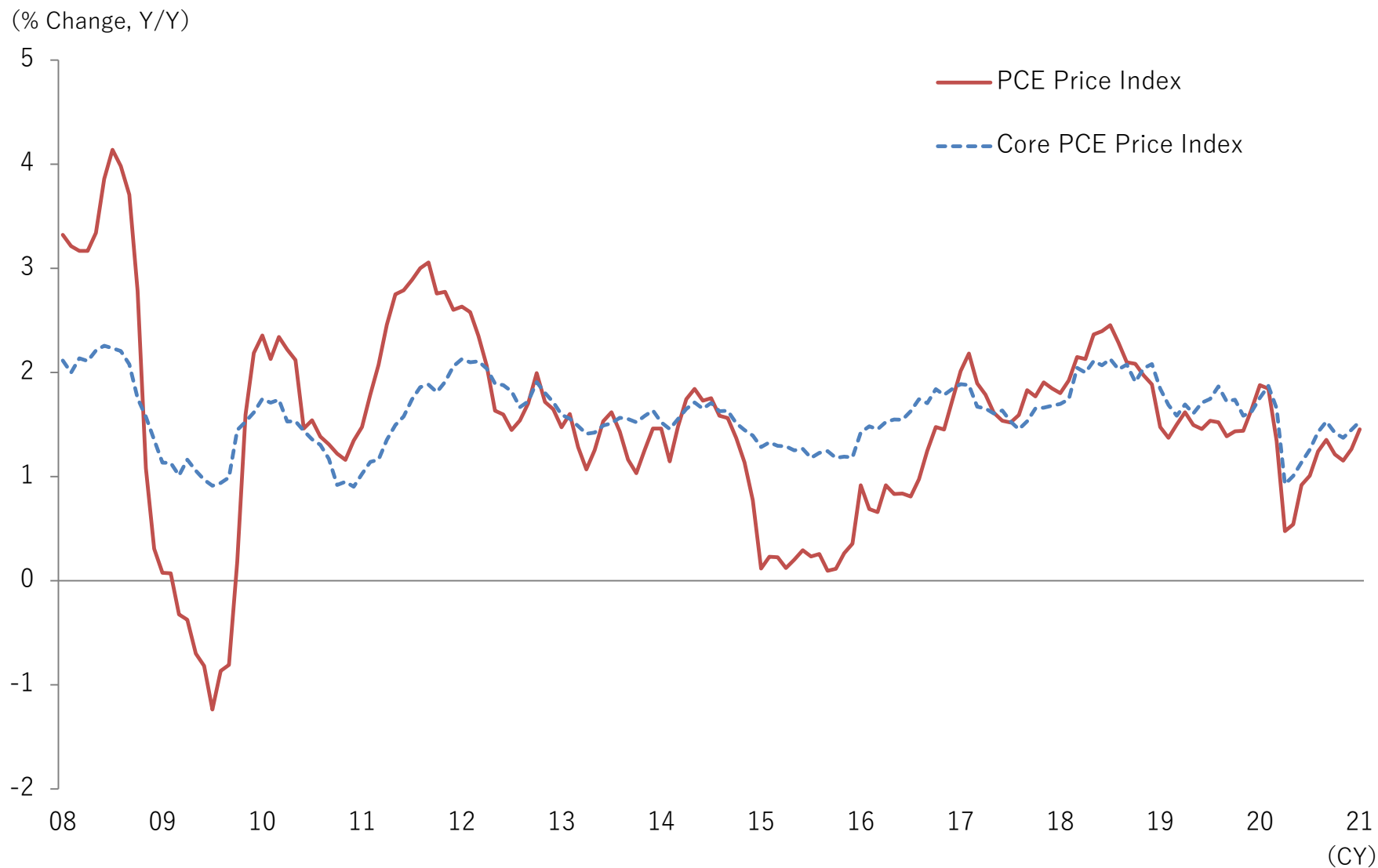
Source: FRB; compiled by DIR  
 Note: Deposits to All commercial banks.

## Disposable Personal Income (DPI)



Source: BEA, CBO, CRFB, Haver Analytics; compiled by DIR

# US PCE Price Index



Source: BEA, Haver Analytics; compiled by DIR

Note: The core PCE price is defined as personal consumption expenditures (PCE) prices excluding food and energy prices.

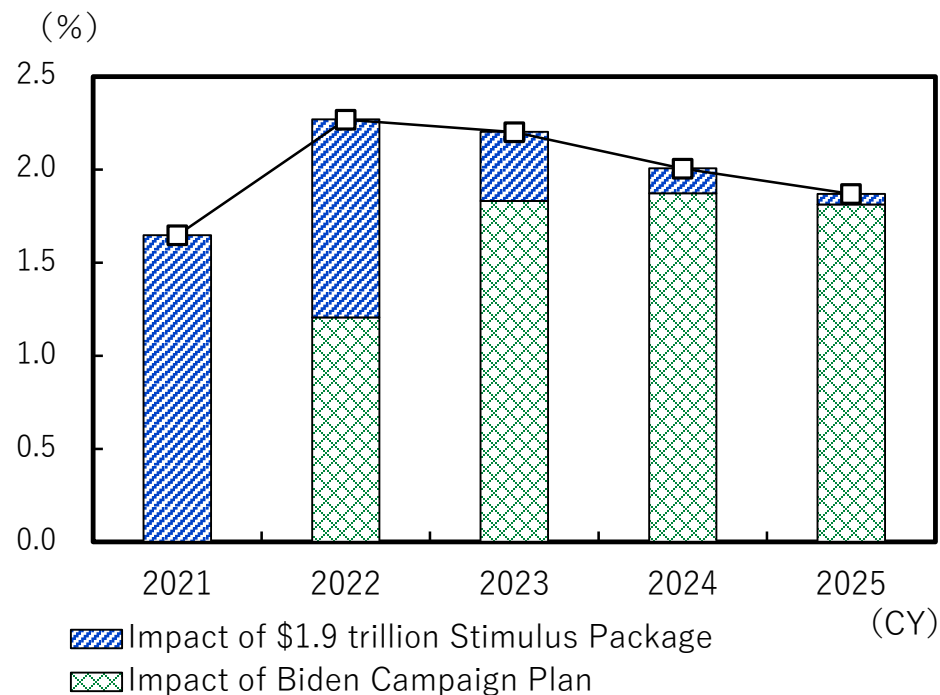
# Bidenomics Benefit Japan's Economy

## President Biden's \$1.9 trillion Stimulus Package

Provision	Cost (bil. USD)
Provide \$1,400 per person "Recovery Rebates" on top of the \$600 already issued	465
Provide aid to state and local governments	350
Increase Unemployment Insurance supplement to \$400/week and extend emergency UI provisions through September	~350
Provide funding for a national vaccination program, testing, and other COVID containment efforts	160
Fund school reopening and increase funding to schools and colleges	170
Expand the Child Tax Credit to a refundable \$3,000 per child, \$3,600 for children under 6 (assuming one year)	~120
Provide rental and small landlord support	30
Provide support to childcare providers	25
Other policy changes	~200
<b>Total Reported Cost</b>	<b>1,900</b>

Source: CRFB; compiled by DIR

## Estimated Impact of Biden Plans on Japan's GDP



Source: CRFB, Tax Policy Center, CBO, BEA, OECD, Cabinet Office of Japan; compiled by DIR

## Impact on Japan's Real GDP

(%, %pt)

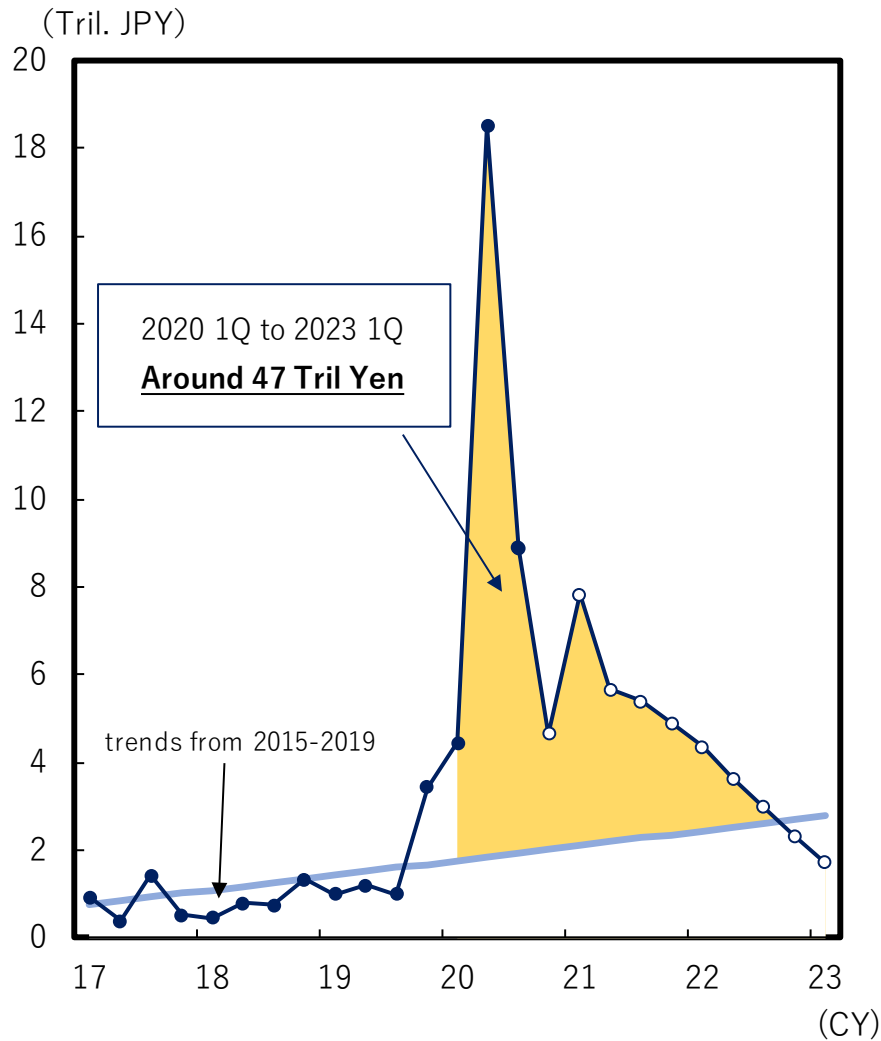
	Real GDP	Private Consumption	Private Residential Investment	Private Non-Resi. Investment	Government Consumption	Public Investment	Exports	Imports
2021	1.65	0.00	0.00	0.89	0.00	-0.18	2.25	-1.23
2022	2.27	0.11	0.02	1.42	-0.10	-0.23	2.63	-1.70
2023	2.20	0.17	0.05	1.41	-0.16	-0.21	2.57	-1.73
2024	2.01	0.21	0.08	1.27	-0.19	-0.17	2.41	-1.61
2025	1.87	0.27	0.09	1.11	-0.20	-0.14	2.33	-1.55

Source: CRFB, Tax Policy Center, CBO, BEA, OECD, Cabinet Office of Japan; compiled by DIR

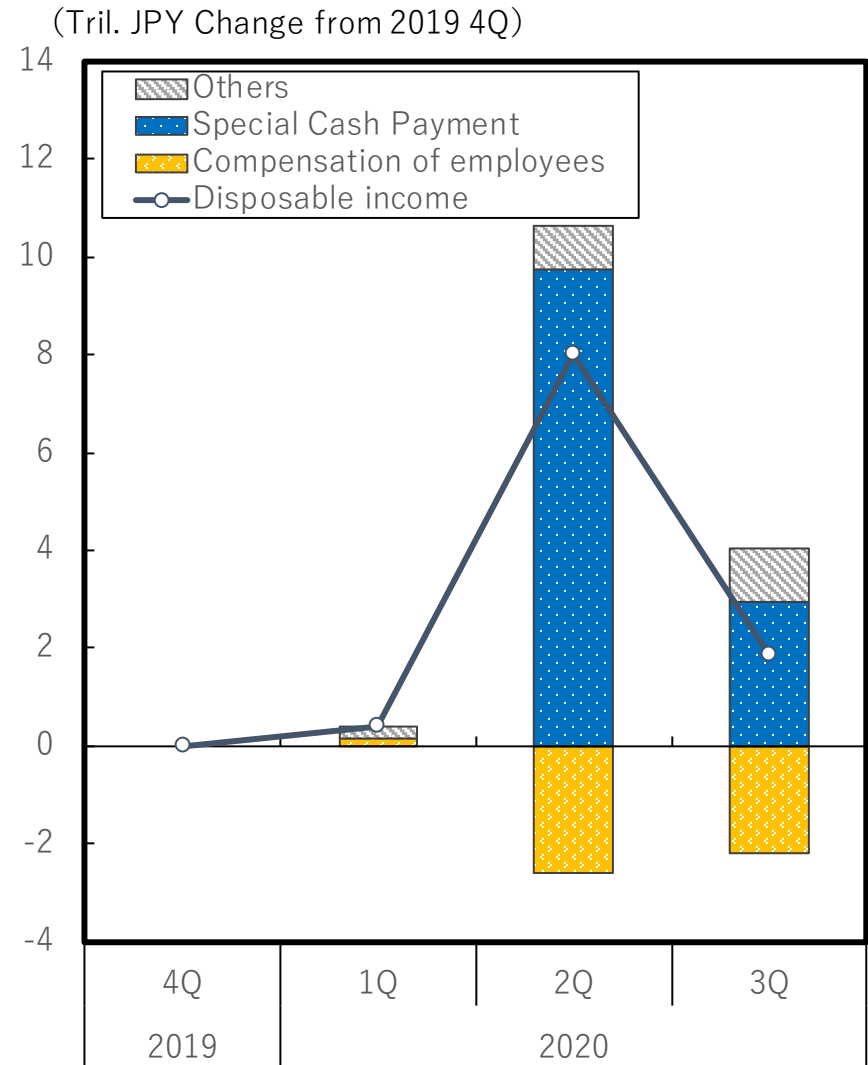
Note: The Impact indicates the difference from the estimate without the plans achieved.

# Change in Household Savings and Disposable Income in Japan

## Household Saving



## Disposable Income



Source: Cabinet Office; compiled by DIR

Notes: 1 Seasonally adjusted values. Unshaded circles estimated by DIR.

2 Savings amount = disposable income – final household consumption expenditure.

# Japanese Economy: Growth Rate and Price Outlook

## ◆ Real GDP Growth Rate

(Yy, %)	DIR	BOJ	Govt	ESP
FY2020	-5.0	-5.6	-5.2	-5.3
FY2021	3.8	3.9	4.0	3.5
FY2022	2.3	1.8	2.4	1.8

## ◆ Core CPI

(Yy, %)	DIR	BOJ	Govt	ESP
FY2020	-0.5	-0.5 (-0.6)	-0.6	-0.5 (-0.9)
FY2021	0.4	0.5	0.4	0.1
FY2022	0.8	0.7	0.3	0.5

Source: DIR Japan's Economic Outlook No. 208 (February 2021), BOJ Outlook for Economic Activity and Prices (January 2021), Japanese Govt. Mid to Long-Term Estimate of Economy & Finance (January 2021) baseline case, ESP February 2021 Survey.

Notes: 1 DIR indicates Daiwa Institute of Research. ESP is the outlook of leading forecasters from private institutes.

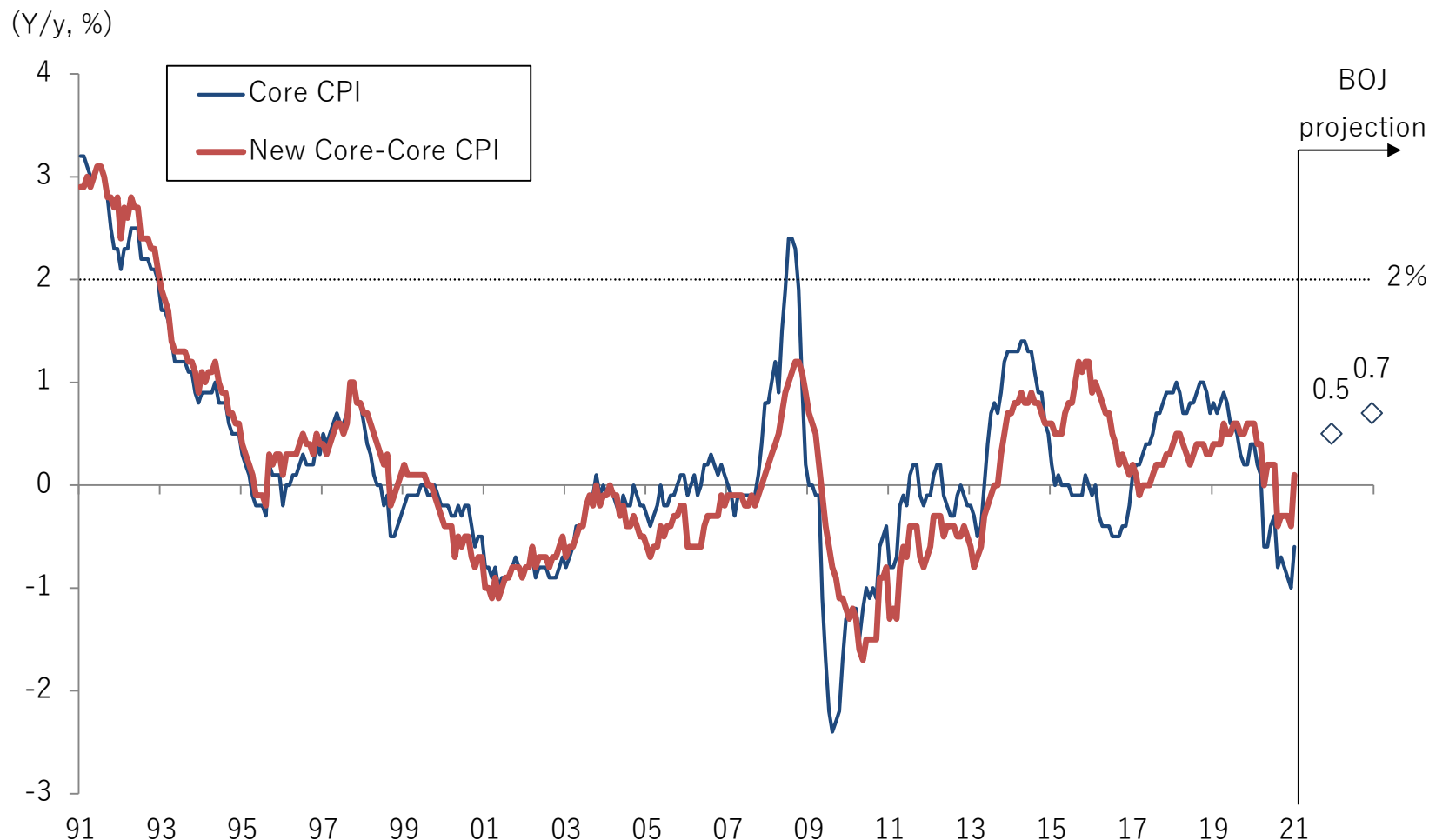
2 The Govt figure uses the CPI total value.

3 Figures in parenthesis exclude the effects of the consumption tax hike and policies concerning the provision of free education.

4 The BOJ figure uses the medians of the Policy Board members' forecasts (point estimates).



# CPI Inflations in Japan



Source: Ministry of Internal Affairs and Communication, Bank of Japan; compiled by DIR

Notes: 1 Japan's core CPI includes everything except fresh food, while new core-core CPI excludes fresh food and energy.

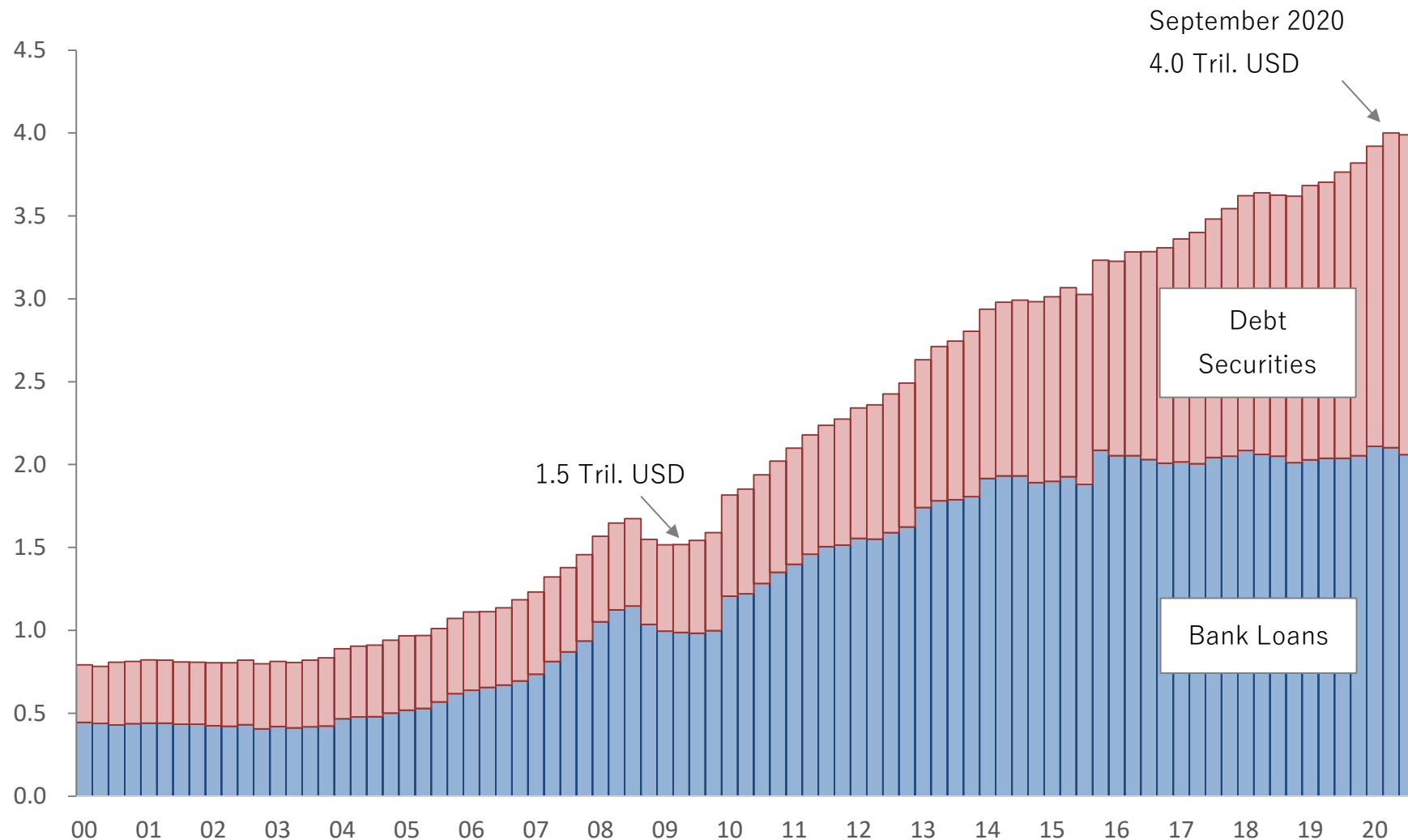
Both have been adjusted for consumption tax.

2 CPI as of January 2021.

3 Rhombus indicate the medians of the BOJ Policy Board members' forecasts about CPI in fiscal 2021 and 2022.

# USD Denominated Debt in EMEs

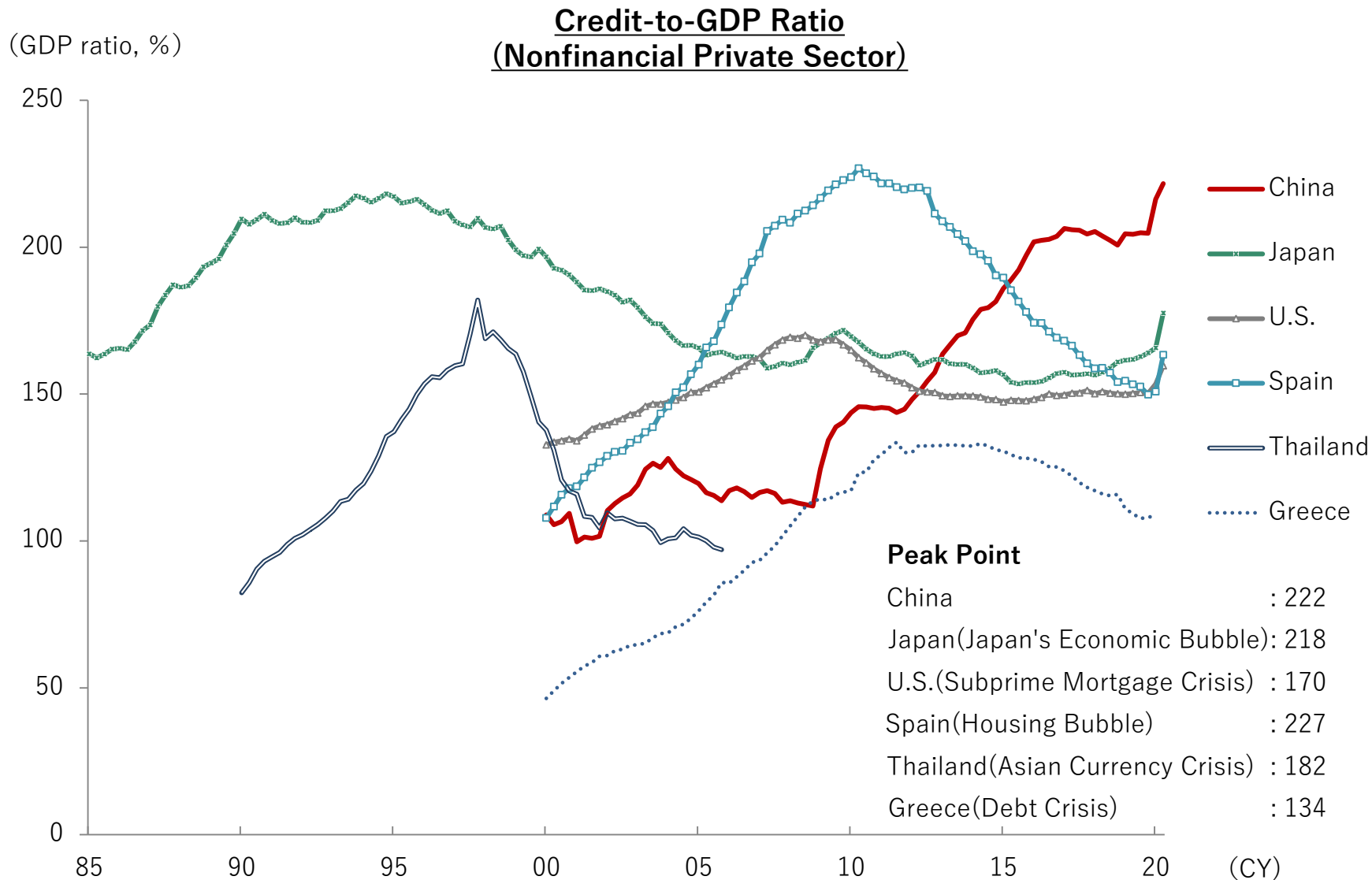
(Tril. USD)



Source: BIS; compiled by DIR

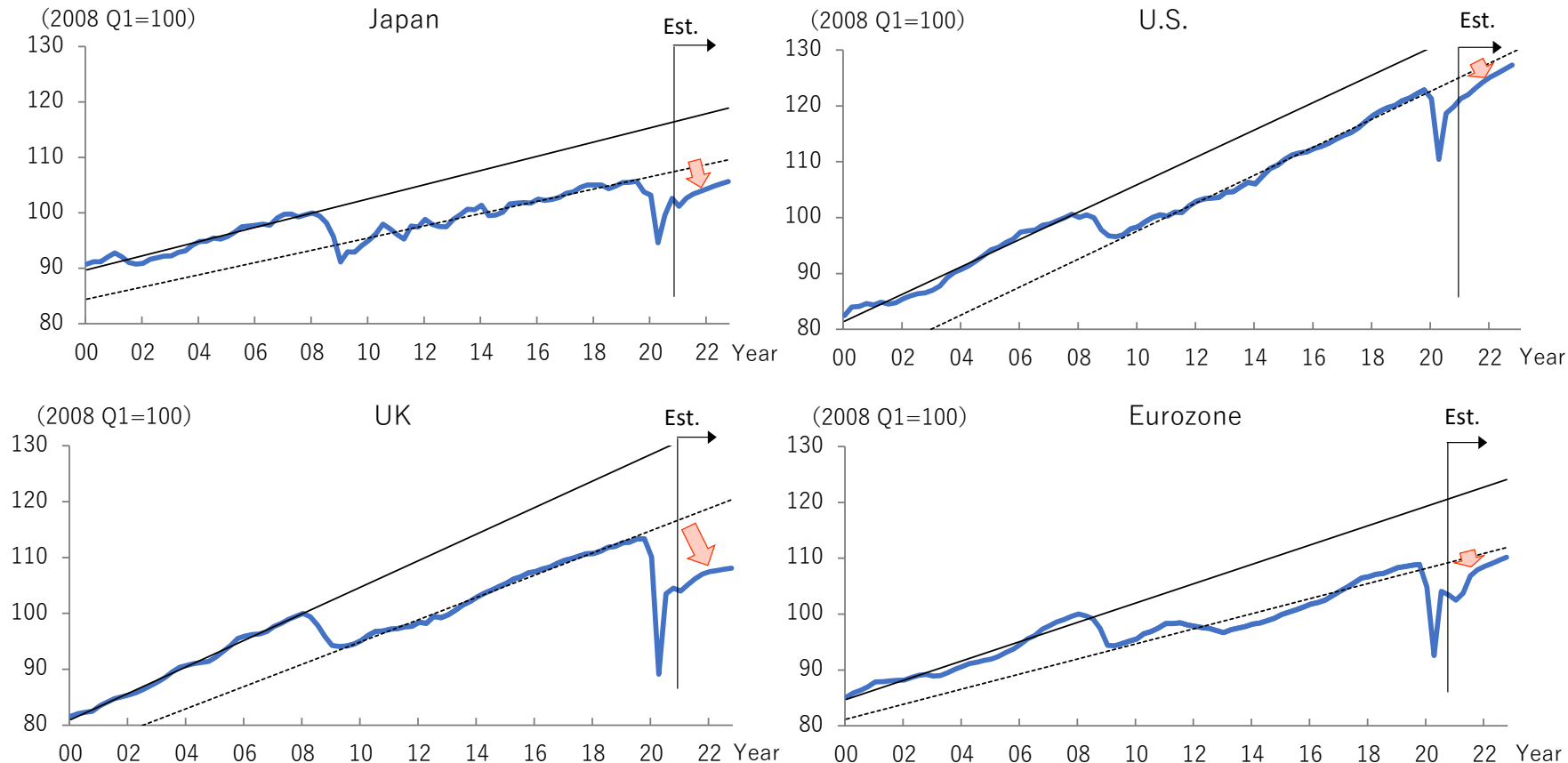
Note: Latest data as of end of September 2020.

# Credit-to-GDP Ratio of Selected Economies (June 2020)



Source : IMF,BIS; compiled by DIR  
 Note: Most recent data as of end of June 2020.

# Real GDP Growth Trends



Real GDP Growth Rates after 2000 Q1 (Annual Average Rate, %)

	Japan	U.S.	UK	Eurozone
Before Global Financial Crisis: ~2008 Q1	1.2	2.4	2.6	2.0
After Global Financial Crisis: ~2019 Q4	0.7	2.0	1.7	1.3
After the Outbreak of COVID-19: ~2020 Q4	0.6	1.8	1.2	0.9

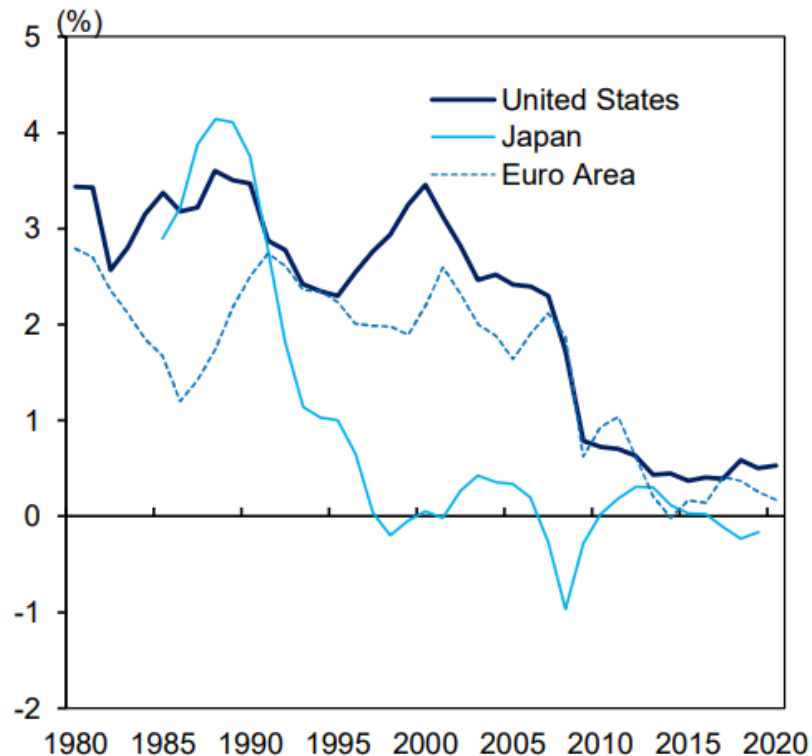
Source: Japan Cabinet Office, Japan Center for Economic Research, U.S. Department of Commerce, U.S. Congressional Budget Office, UK Office for National Statistics, European Commission; compiled by DIR

Notes: 1 Solid lines indicate GDP trends from 2000 Q1 to 2008 Q1. Dotted lines indicate GDP trends from 2009 Q3 to 2019 Q4.

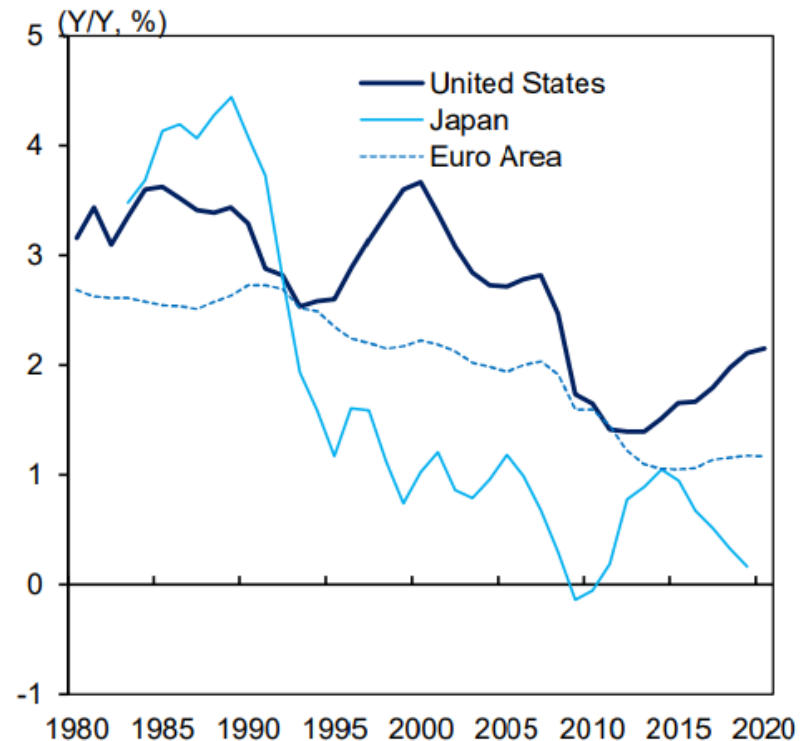
2 The prediction references the ESP Survey of the Japan Center for Economic Research in the case of Japan (10 Feb. 2021), and the U.S. Department of Commerce and U.S. Congressional Budget Office in the case of the U.S. (11 Feb. 2021). The European Commission is referenced for the UK (5 Nov. 2020) and the Eurozone (11 Feb. 2021).

# The Natural Rate of Interest and Potential Growth

## The natural rate of interest ( $r^*$ )



## Potential growth rate ( $y^*$ )

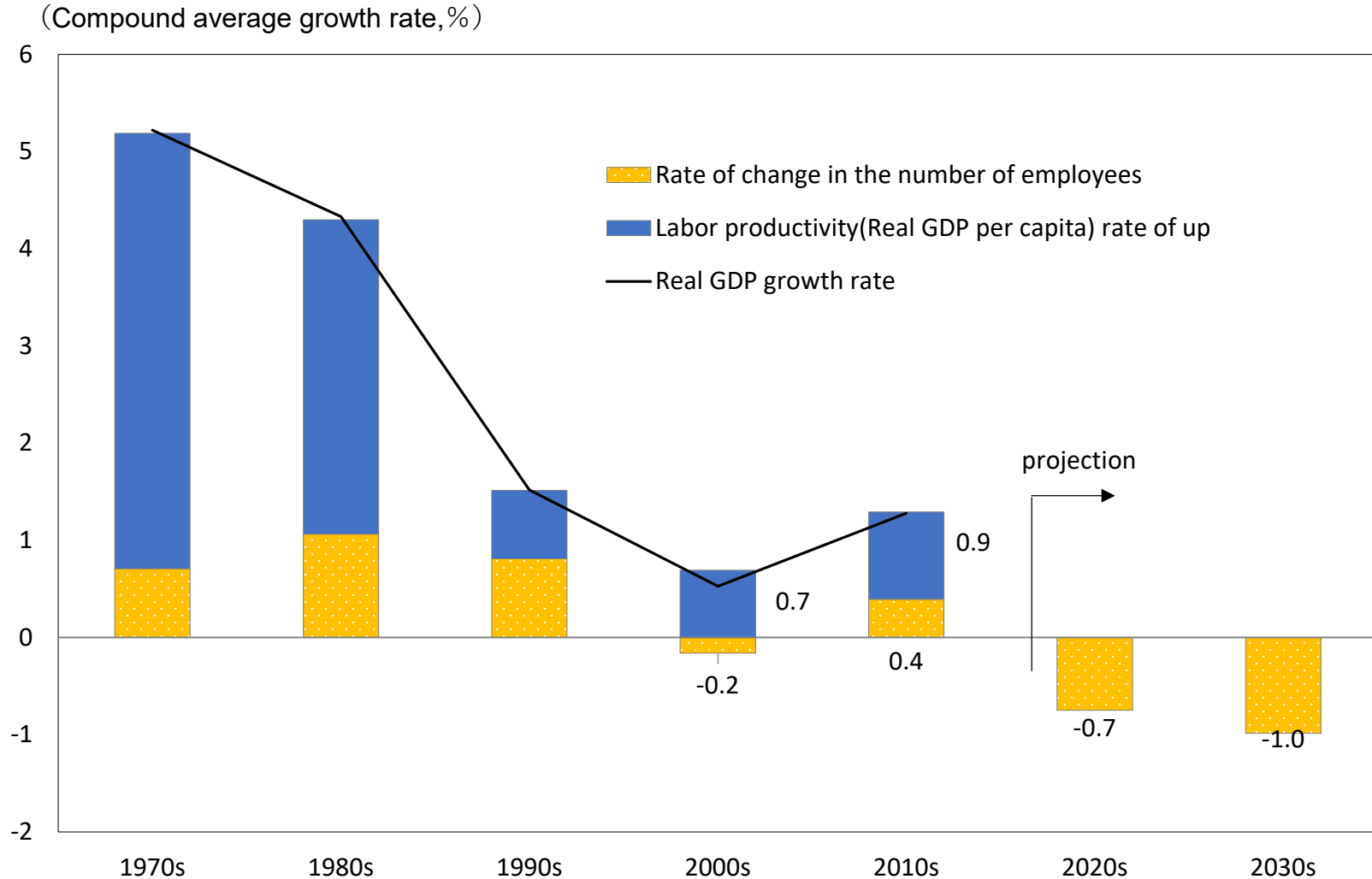


Source: Holston, K., T. Laubach, and J. C. Williams (2017): "Measuring the Natural rate of Interest: International Trends and Determinants," *Journal of International Economics*, Fujiwara et al. (2016): "Supplementary Paper Series for the "Comprehensive Assessment" (2): Developments in the Natural Rate of Interest in Japan," Bank of Japan Review Series 16-E-12, Bank of Japan

Source: Toshitaka Sekine, Hitotsubashi University "Economic Crisis and Recovery with COVID-19" (September 9, 2020)

# Breakdown of Japan's Supply-Side GDP Growth Rate

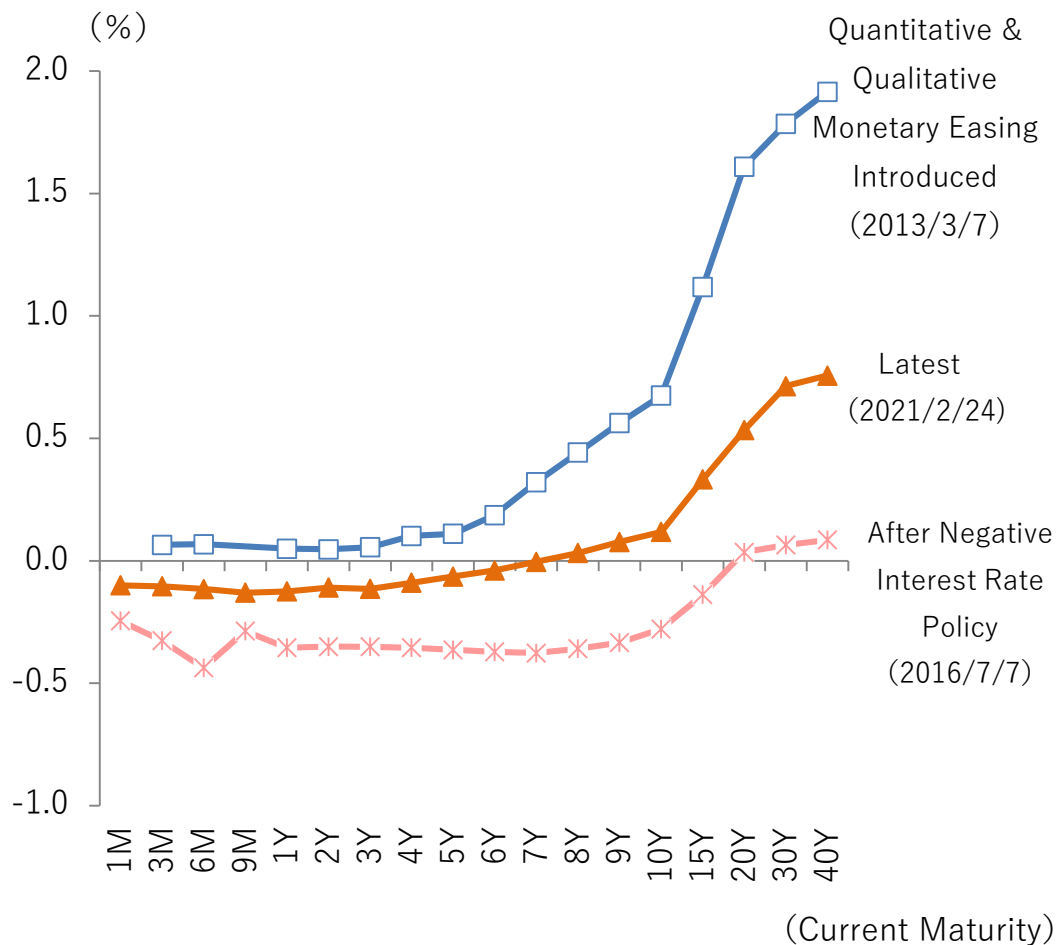
## Japan's Real GDP Growth Rate



Source: Prepared by DIR based on Cabinet Office data, Ministry of Internal Affairs and Communications, National Institute of Population and Social Security Research  
 Note: The rate of change in the number of workers after 2020 is the average annual rate of change in the number of employees which was calculated based on the estimated future population (based on both birth and death at mid-level) and the outlook of employment rate (based on a scenario whereby employment rate for each age group and gender stays at 2019 level)

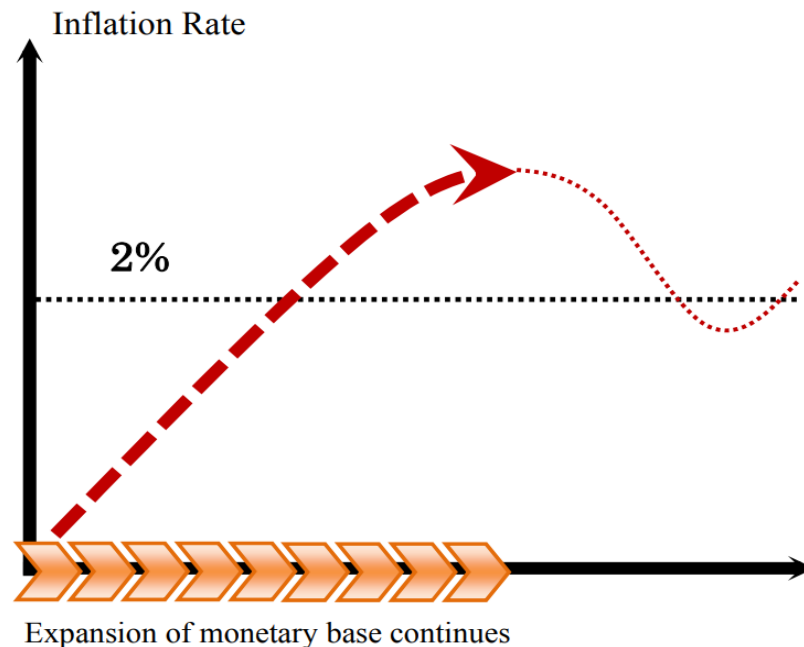
# Quantitative and Qualitative Monetary Easing with Yield Curve Control

## Yield Curve Control



Source: Haver Analytics; compiled by DIR

## Inflation-Overshooting Commitment

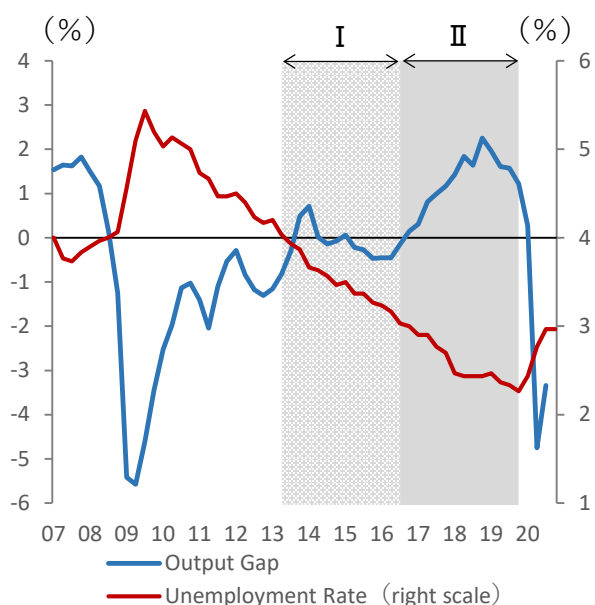


Expanding the monetary base until the year-on-year rate of increase in the observed CPI (all items less fresh food) exceeds the price stability target of 2 percent and stays above the target in a stable manner.

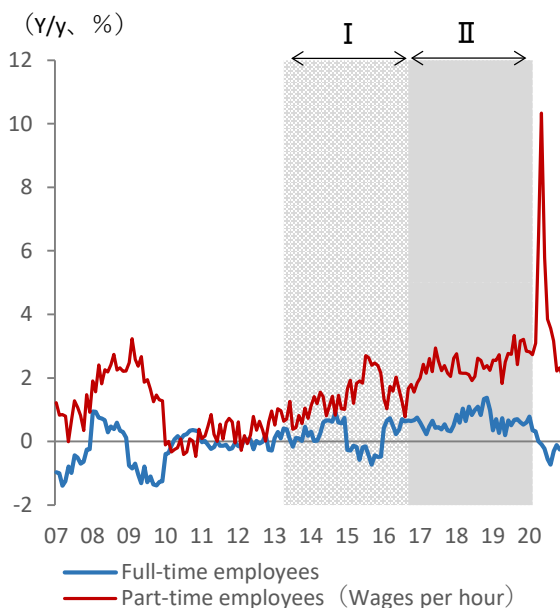
Source: Kuroda, Haruhiko(2017) "The Role of Expectations in Monetary Policy: Evolution of Theories and the Bank of Japan's Experience", Speech at the University of Oxford; compiled by DIR

# Economic indicators after the introduction of “QQE” and “YCC”

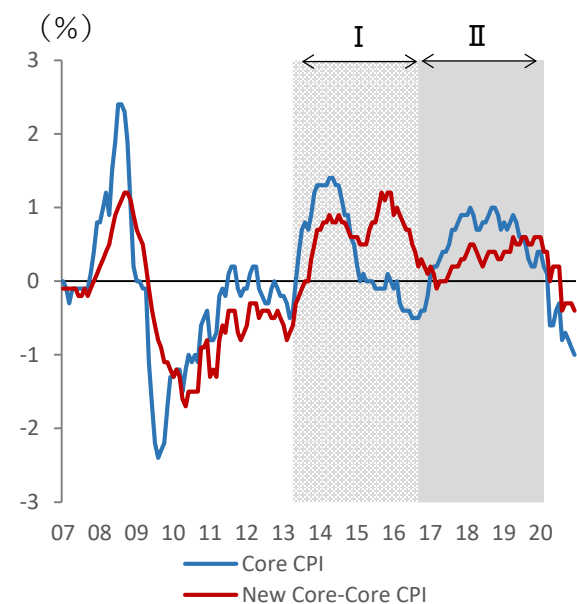
## Output Gap, Unemployment Rate



## Scheduled Cash Earnings



## CPI



Source: Bank of Japan, Ministry of Internal Affairs and Communications, Ministry of Health, Labour and Welfare ; compiled by DIR

Notes: 1 I represents after QQE (April 2013~), II represents after YCC (September 2016~).

2 Part-time employees (Wages per hour) is obtained by dividing scheduled cash earnings by scheduled hours worked.

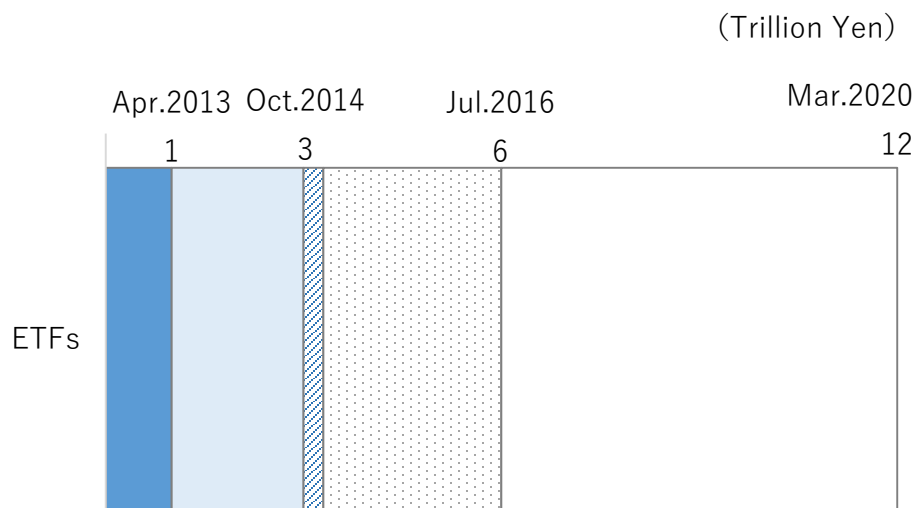


# Bank of Japan's Purchases of ETFs

## Annual purchase Targets

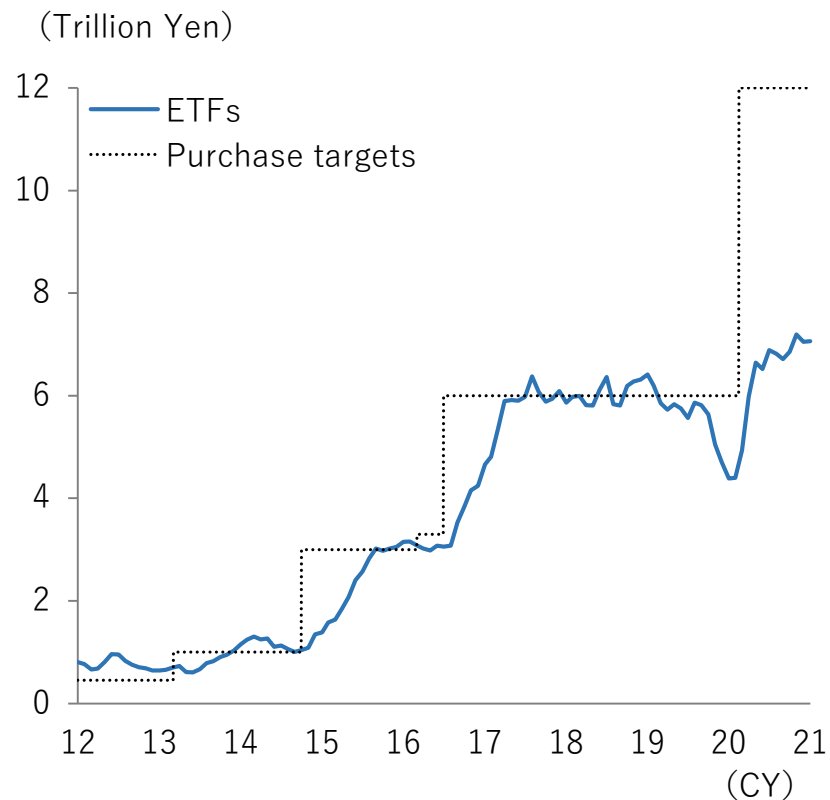
(Billion Yen)

MPM	ETFs
2010/10/28	450
2013/4/4	1,000
2014/10/31	3,000
2016/3/15	3,300
2016/7/29	6,000
2020/3/16	12,000



Source: Bank of Japan; compiled by DIR  
 Note: Figures in October 2010 indicate upper limit of purchase.  
 Figures in March 2020 indicate upper limit of annual purchase.

## Annual purchase of ETFs



Source: Bank of Japan; compiled by DIR  
 Note: Dashed lines represent purchase targets.  
 After March 2020, they represent upper limit of annual purchase.

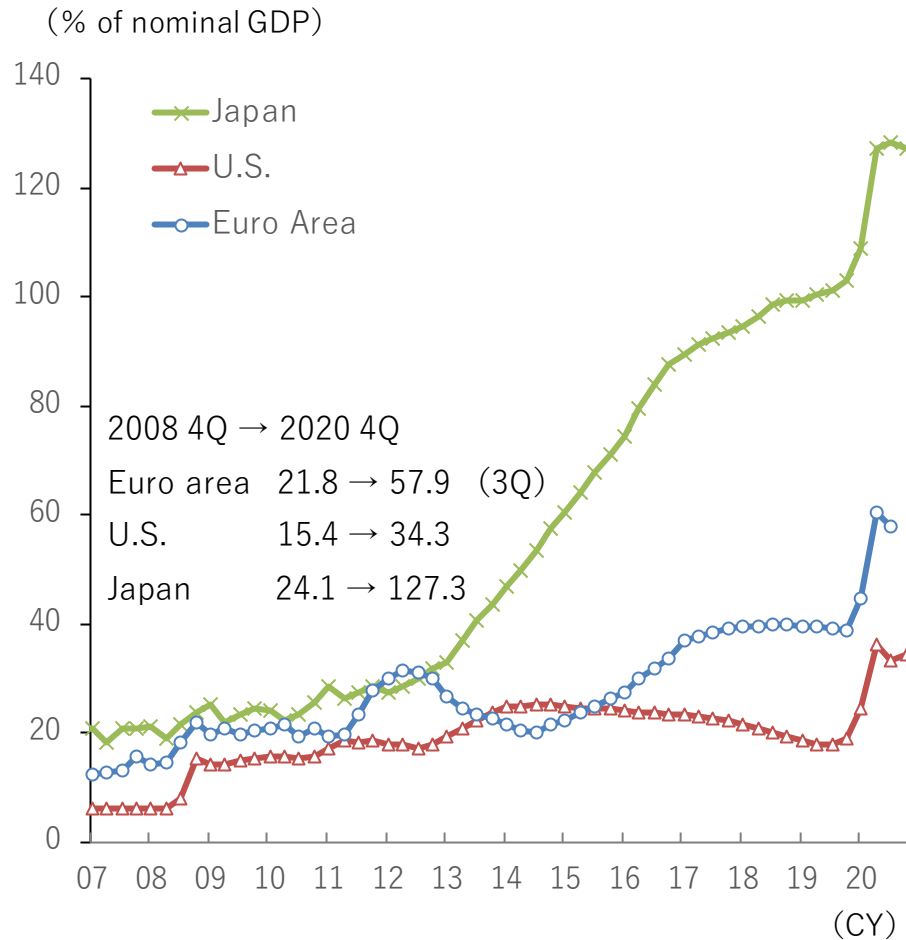
# New Lender of Last Resort Functions

New LLR	Example
MMLR ( Market Maker of Last Resort )	(ECB) PEPP (Fed) CPFF, PMCCF, SMCCF (BOJ) Outright Purchases of CP and Corporate Bonds
GLLR ( Global Lender of Last Resort )	Central Bank Liquidity Swaps
ELLR ( Expanded Lender of Last Resort )	(ECB) TLTRO III, PELTRO (Fed) Main Street Lending Program (MSLP) (BOJ) Special Funds-Supplying Operations to Facilitate Financing in Response to the Novel Coronavirus (COVID-19) (BOE) Term Funding Scheme with additional incentives for SMEs (TFSME)

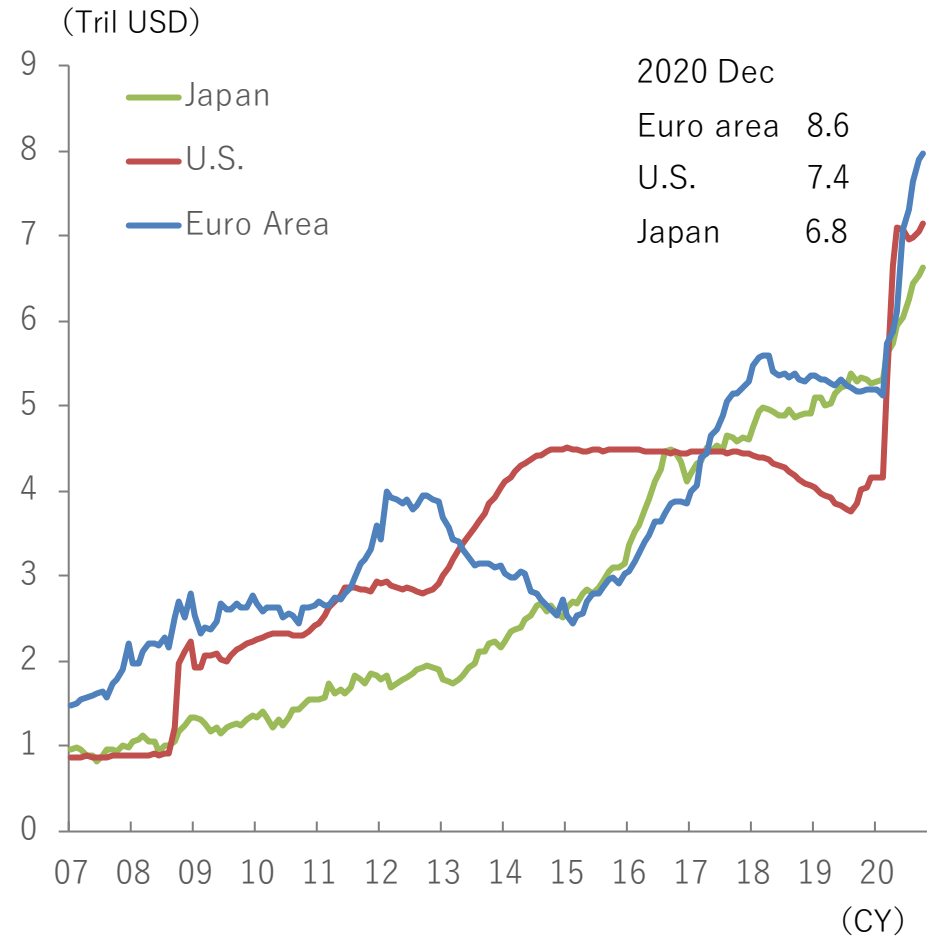
Source: BOE, BOJ, Fed, ECB; compiled by DIR

# Assets of Central Banks

Central Bank Assets as a % of nominal GDP



In USD

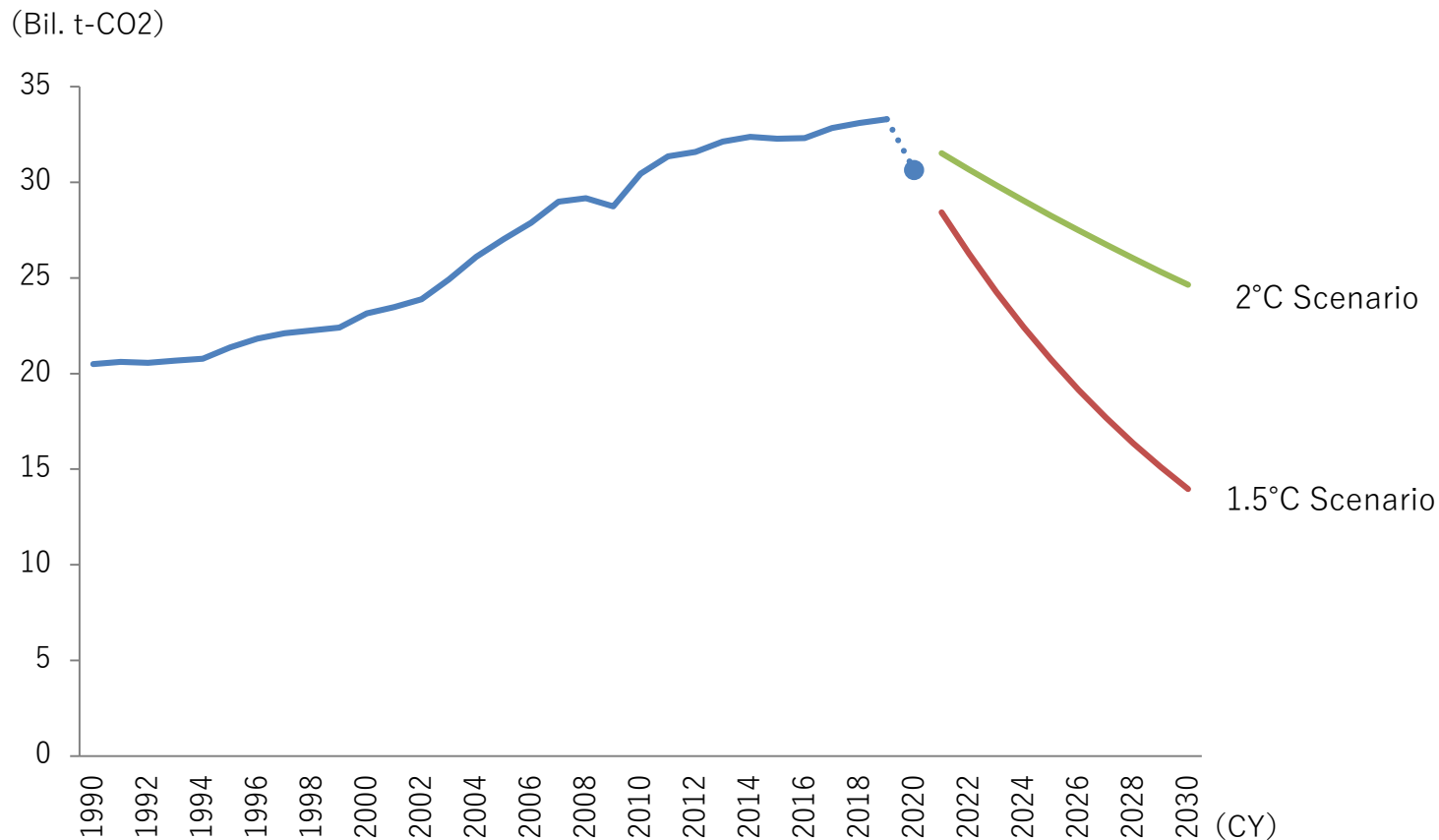


Source: ECB, Fed, BOJ; compiled by DIR

Note: Assets of BOJ and ECB are converted from JPY and EUR to USD at the monthly average.

# Global CO<sub>2</sub> Emissions under Different Scenarios

## CO<sub>2</sub> Emissions from Fuel Combustion

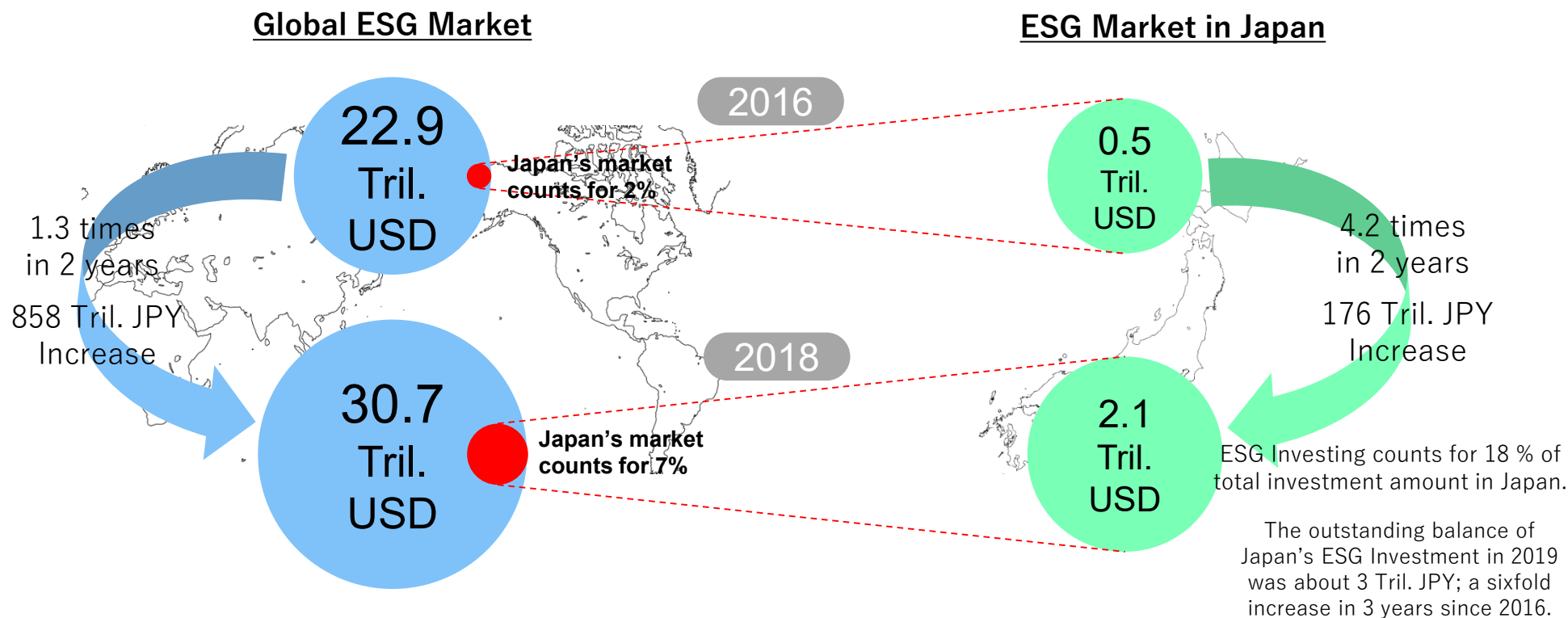


Source: IEA, United Nation Environment Program; compiled by DIR

Note: Emissions in 2020 is based on the IEA prediction (8% less than 2019). Emissions from 2020 to 2030 are calculated based on estimates in the “Emissions Gap Report” published by the UN Environment Program. According to the program, the required cuts in emissions are 2.7 per cent per year from 2020 for the 2°C goal and 7.6 per cent per year on average for the 1.5 °C goal (The emission reductions necessary to limit global warming to well below 2 °C and 1.5 °C in accordance with the Paris Agreement).

# ESG Investment is Growing Worldwide

- Sustainable finance including ESG is rapidly growing worldwide and is now becoming crucial for the investment decision making process of mainstream investors.
- ESG investment in Japan became more prevalent after the GPIF signed the “Principles for Responsible Investment (PRI)” in 2015, but the size of the market is still small in a global comparison.



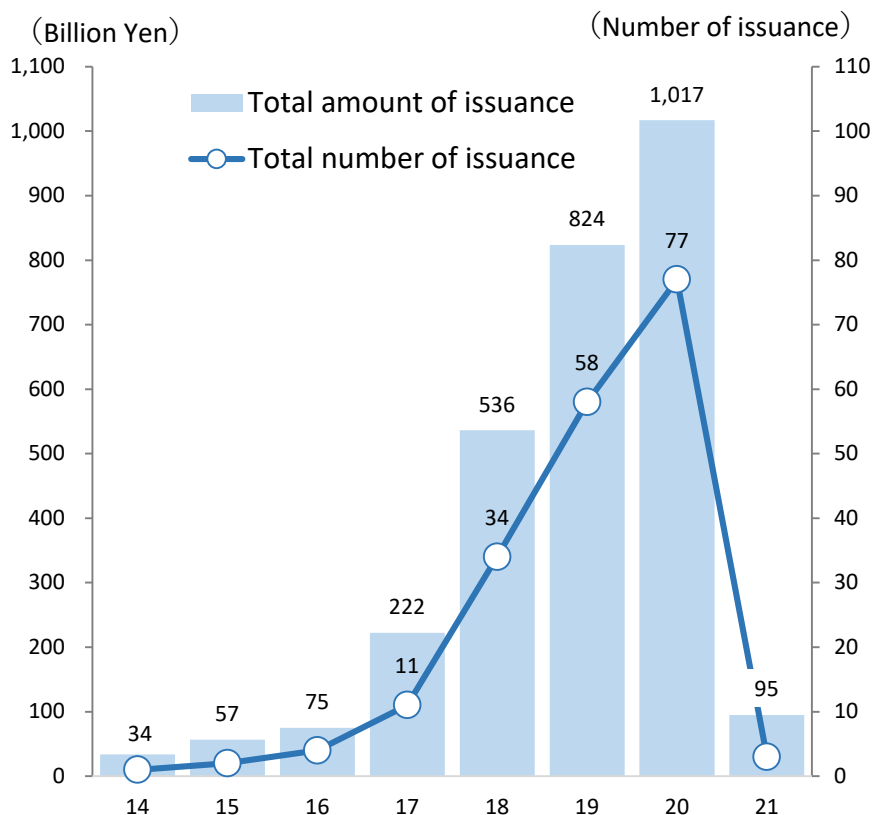
Source: 3kaku-K, The Japan Sustainable Investment Forum; compiled by Ministry of the Environment, translated into English by DIR

Source: FinCity.Tokyo

# Green Bond Issuance

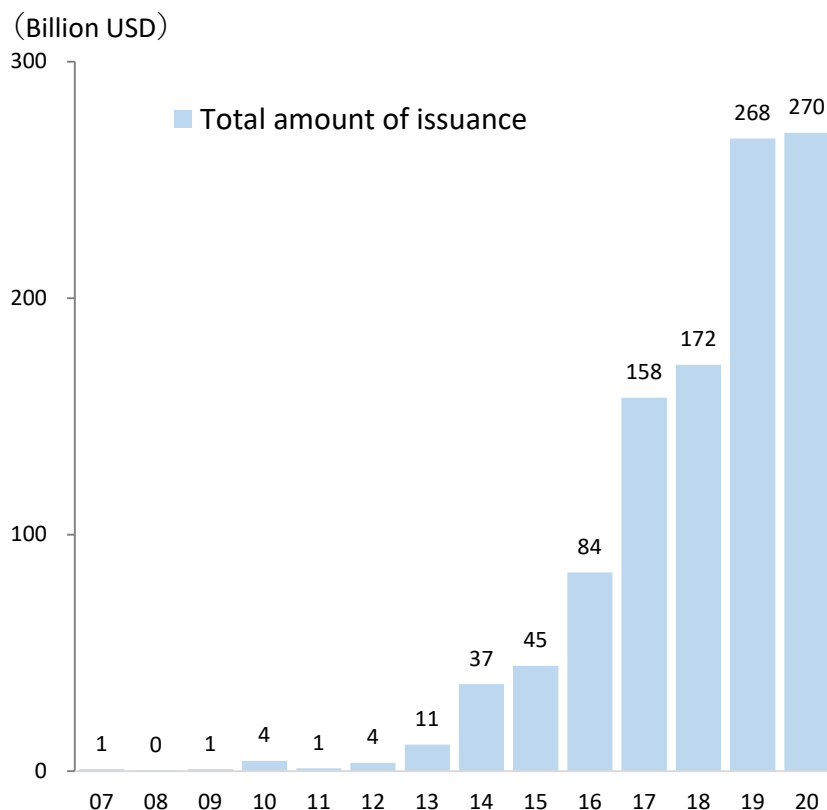
- Green Bonds have been rapidly spreading internationally. The amount of global Green Bond issuance was about 270 billion USD in 2020. Although the amount of issuances in Japan is increasing, compared with other countries, the scale and number of issuances is limited.

## Issuance of Green Bonds by Japanese Companies and Other Entities



Original source: Climate Bonds Initiative, As of January 2021.  
Source: The Ministry of the Environment, compiled by DIR

## Global Trends in Green Bond Issuance Amounts

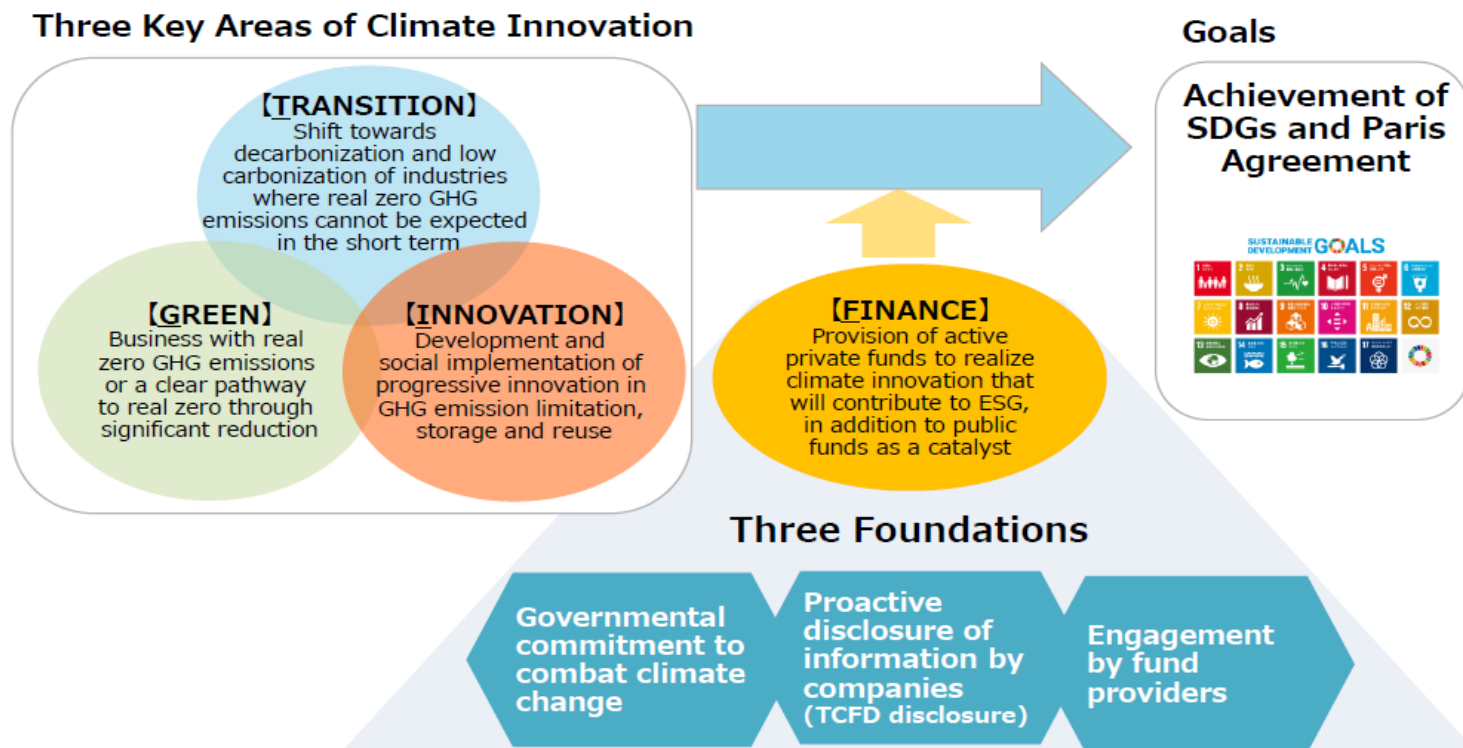


Original source: Climate Bonds Initiative, As of January 2021.  
Source: The Ministry of the Environment, compiled by DIR

# Basic Concept of Climate Innovation Finance

- To achieve SDGs and the Paris Agreement, it is important to simultaneously promote transition (T), green (G) and innovation (I), and to finance (F) these projects, rather than taking a binary approach to “green” or “nongreen”.
- To this end, we will establish the three foundations: government commitment to address climate change, the proactive disclosure of information by companies, and engagement by suppliers of funds.

## [Achieving goals by simultaneous promotion of TGIF (Illustration)]



Source: Ministry of Economy, Trade and Industry, Industrial Science and Technology Policy and Environment Bureau (September 16, 2020), “Interim Report of the Study Group on Environmental Innovation Finance, Climate Innovation Finance Strategy 2020”

# Policy recommendations by FinCity.Tokyo and progress status( 1 / 2 )

Not Exhaustive

Issues and main items	Progress status
<p><b>1</b></p> <p><b>Preferential tax treatment for asset management firms etc</b></p> <ul style="list-style-type: none"> <li>➤ Corporate tax</li> <li>➤ Inheritance tax</li> <li>➤ Income tax</li> </ul>	<ul style="list-style-type: none"> <li>➤ <u>Deduction of performance based compensation to become possible</u> for non-listed companies which mainly operate asset management business, subject to meeting certain conditions (To be introduced from 1 April 2021 onwards)</li> <li>➤ <u>Assets outside of Japan held by a foreign national who is resident in Japan for work etc will be exempt from Japanese inheritance tax</u> regardless of their years of residence (To be introduced from 1 April 2021 onwards)</li> <li>➤ Clarification that carried interest should not be subject to comprehensive taxation but <u>be taxed as capital gains tax as separate taxation</u> if deemed as economically rational (Introduction planned for spring 2021)</li> </ul>
<p><b>2</b></p> <p><b>Sophistication of asset owners and promotion of market entry by asset managers</b></p> <ul style="list-style-type: none"> <li>➤ Credit insurance and financial support for independent asset managers etc</li> <li>➤ Introducing a Manager Registration system similar to those run in the US</li> <li>➤ Implementation of the Emerging Manager Program (EMP) to seed emerging managers</li> <li>➤ Legislative reform to facilitate diversification of sophistication of management of corporate pension funds</li> </ul>	<ul style="list-style-type: none"> <li>➤ Amendments to be introduced in order for <u>independent asset managers to become eligible for credit insurance and loans by Japan Finance Corporation etc</u></li> <li>➤ Confirmation that <u>independent asset managers and fintech companies are eligible for Loan Support Program provided by the Bank of Japan.</u></li> <li>➤ <u>Tokyo Metropolitan Government(TMG) to run regular seminars to provide knowhow on setting up an asset management business</u> to financial professionals with an aspiration to run their own asset management business.</li> <li>➤ TMG plans <u>to set up a fund to support fintech businesses etc.</u> (FY 2021)</li> <li>➤ Further deliberation on details is required</li> </ul>

Source: FinCity.Tokyo



# Policy recommendations by FinCity.Tokyo and progress status(2/2)

Not Exhaustive

	Issues and main items	Progress status
3	<b>Simplification of Japan entry process for foreign asset management firms etc</b> <ul style="list-style-type: none"> <li>➤ Further reduction of time required for obtaining an FIEA license</li> <li>➤ Business continuity support for overseas financial institutions whose business faces disruption by natural hazards etc</li> </ul>	<ul style="list-style-type: none"> <li>➤ <u>Financial Market Entry Office was established by FSA and Finance Bureau (22 January, 2021)</u></li> <li>➤ <u>Enforcement of Amended Cabinet Office Order to enable the use of English in registration and supervision of overseas asset management companies etc (12 January, 2021)</u></li> <li>➤ <u>Establishment of exception measures for overseas asset management with a proven track record to enable entry under a simplified procedure (Bill to be submitted for the 2021 Ordinary Diet session)</u></li> <li>➤ <u>Enforcement of the amended Cabinet Office Order Art 2 on Definition (22 July 2020) to enable overseas financial institutions which have difficulty in continuing their business operation in their home jurisdiction due to natural hazards etc to continue their business operation for a given scope in Japan without having to obtain an FIEA license up to a period of 3 months</u></li> </ul>
4	<b>Reduction of operational cost of asset management companies etc</b> <ul style="list-style-type: none"> <li>➤ Reduction of cost associated with asset management business</li> </ul>	<ul style="list-style-type: none"> <li>➤ <u>TMG subsidizes part of the cost incurred in outsourcing of mid/back office</u></li> <li>➤ <u>TMG subsidizes part of the cost incurred in office establishment, eg personnel hire cost</u></li> </ul>
5	<b>Preparation of office/living environment for foreign nationals</b> <ul style="list-style-type: none"> <li>➤ Subsidies towards rent for office space etc</li> <li>➤ Relaxation of status of residence etc for highly skilled foreign professionals such as criteria for accompanying domestic helpers</li> </ul>	<ul style="list-style-type: none"> <li>➤ <u>TMG subsidizes accommodation costs incurred in association with pre-survey visits by prospective entering firms.</u></li> <li>➤ <u>" Comprehensive Economic Measures to Secure People's Lives and Livelihoods toward Relief and Hope " (December 8th, Cabinet decision) stipulated <u>exception for granting of residential status, introduction of a bonus point system for highly skilled foreign professionals (asset managers), relaxation for criteria for hiring domestic helpers, exception measures to improve convenience for employment of spouses.</u></u></li> </ul>
6	<b>Abolishment of business customs which are unique to Japan</b> <ul style="list-style-type: none"> <li>➤ Streamlining duplicated reporting obligations to authorities, trade associations, exchanges, public pension funds etc</li> </ul>	<ul style="list-style-type: none"> <li>➤ <u>The aforementioned Economic Measures stipulated digitization of charts and tables, consolidation and centralized submission.</u></li> </ul>

Source: FinCity.Tokyo

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Attention

This cover letter is an unofficial translation. The official document is in Japanese.

## **Notification items pursuant to Article 37 of the Financial Instruments and Exchange Law**

**(This Notification is only applicable to where report is distributed by Daiwa Securities Co. Ltd.)**

If you decide to enter into a business arrangement with our company based on the information described in materials presented along with this cover letter, we ask you to pay close attention to the following items.

- In addition to the purchase price of a financial instrument, our company will collect a trading commission\* for each transaction as agreed beforehand with you. Since commissions may be included in the purchase price or may not be charged for certain transactions, we recommend that you confirm the commission for each transaction. In some cases, our company also may charge a maximum of ¥ 2 million (including tax) per year as a standing proxy fee for our deposit of your securities, if you are a non-resident.
- For derivative and margin transactions etc., our company may require collateral or margin requirements in accordance with an agreement made beforehand with you. Ordinarily in such cases, the amount of the transaction will be in excess of the required collateral or margin requirements\*\*.
- There is a risk that you will incur losses on your transactions due to changes in the market price of financial instruments based on fluctuations in interest rates, exchange rates, stock prices, real estate prices, commodity prices, and others. In addition, depending on the content of the transaction, the loss could exceed the amount of the collateral or margin requirements.
- There may be a difference between bid price etc. and ask price etc. of OTC derivatives handled by our company.
- Before engaging in any trading, please thoroughly confirm accounting and tax treatments regarding your trading in financial instruments with such experts as certified public accountants.

\* The amount of the trading commission cannot be stated here in advance because it will be determined between our company and you based on current market conditions and the content of each transaction etc.

\*\* The ratio of margin requirements etc. to the amount of the transaction cannot be stated here in advance because it will be determined between our company and you based on current market conditions and the content of each transaction etc.

When making an actual transaction, please be sure to carefully read the materials presented to you prior to the execution of agreement, and to take responsibility for your own decisions regarding the signing of the agreement with our company.

Corporate Name: Daiwa Securities Co. Ltd.

Registered: Financial Instruments Business Operator, Chief of Kanto Local Finance Bureau  
(Kin-sho) No.108

Memberships: Japan Securities Dealers Association  
The Financial Futures Association of Japan  
Japan Investment Advisers Association  
Type II Financial Instruments Firms Association