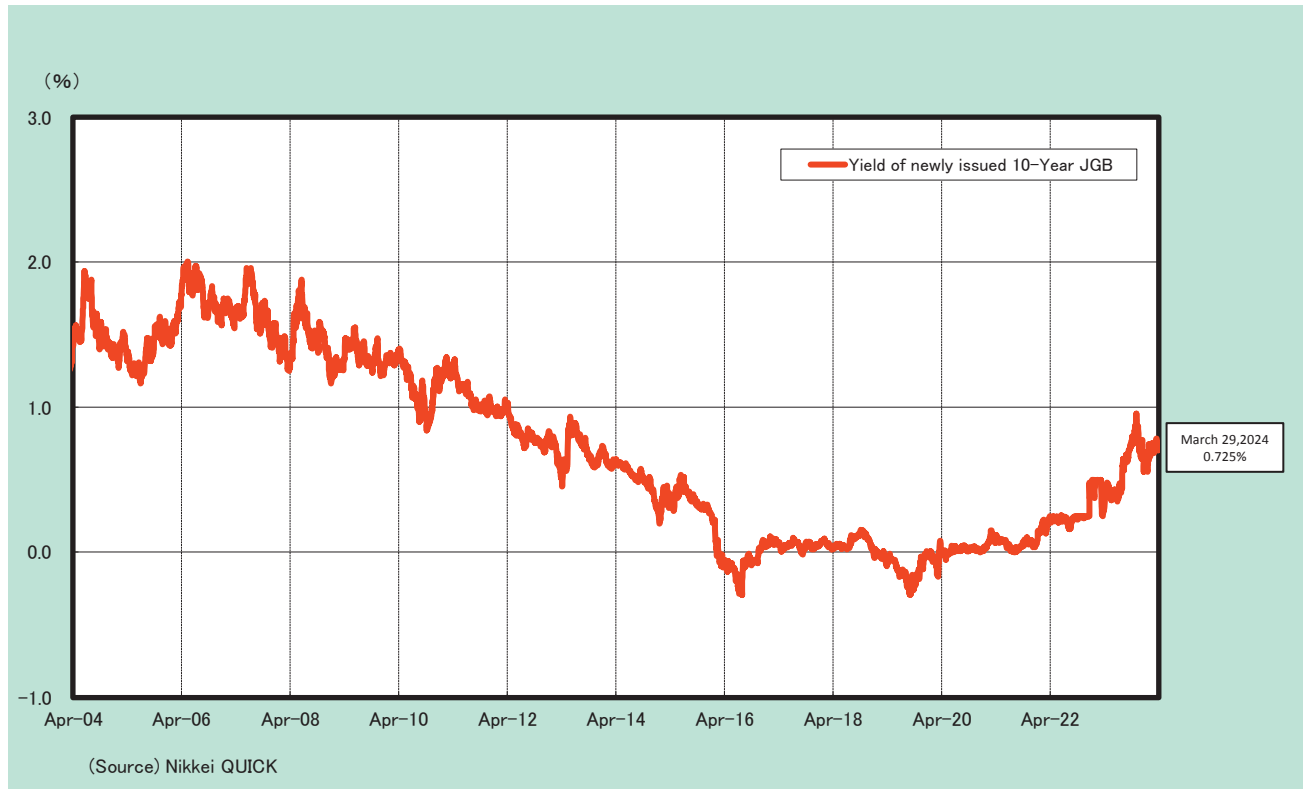
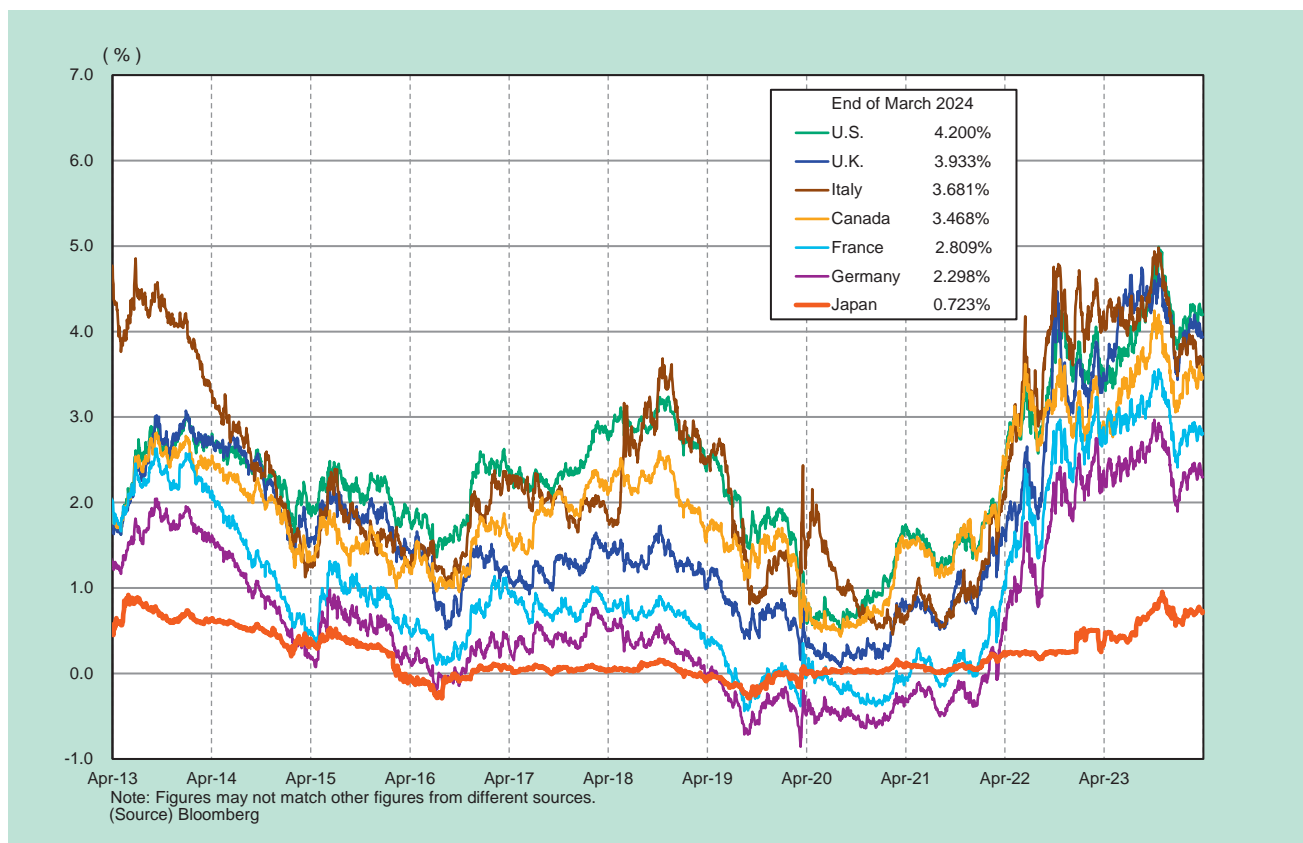


## 2 Secondary Market for Government Bonds

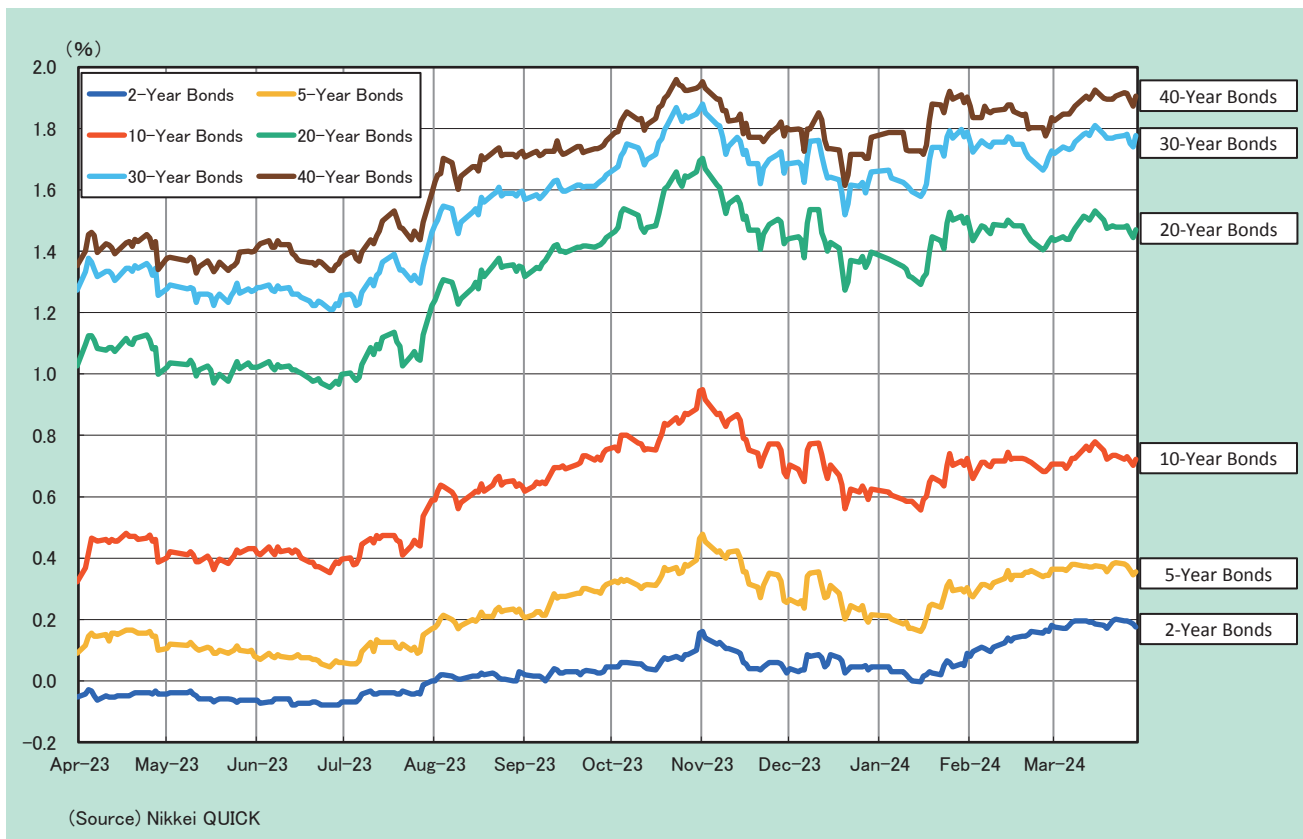
### (1) 10-Year JGB Yield



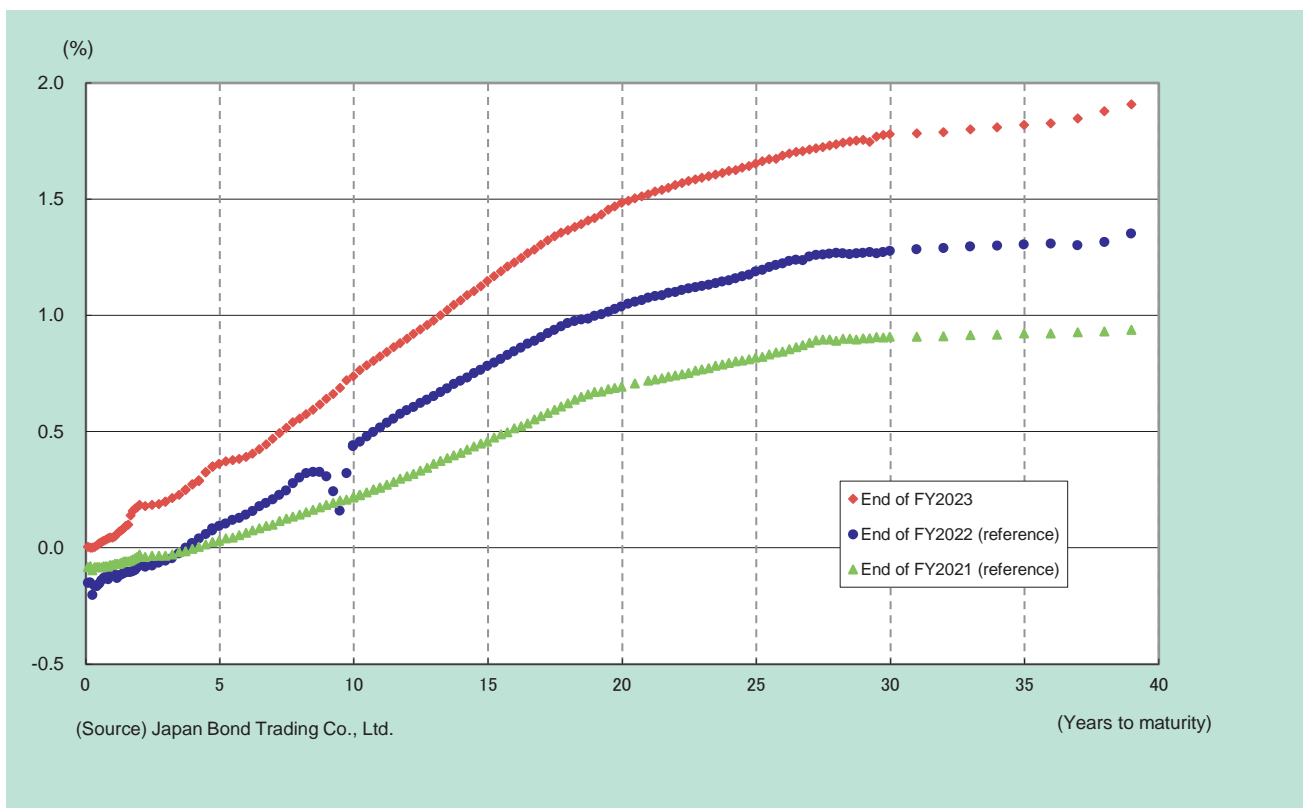
### (2) 10-Year Government Bonds Yields

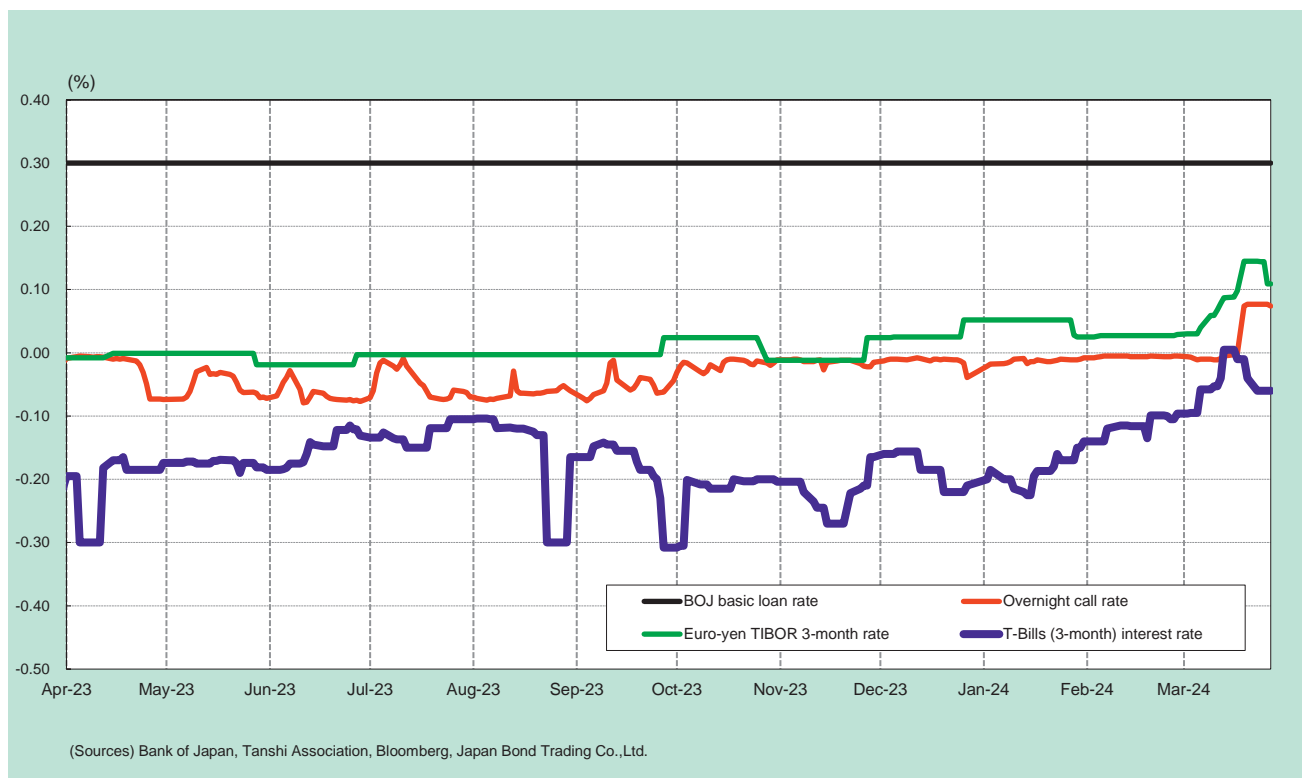
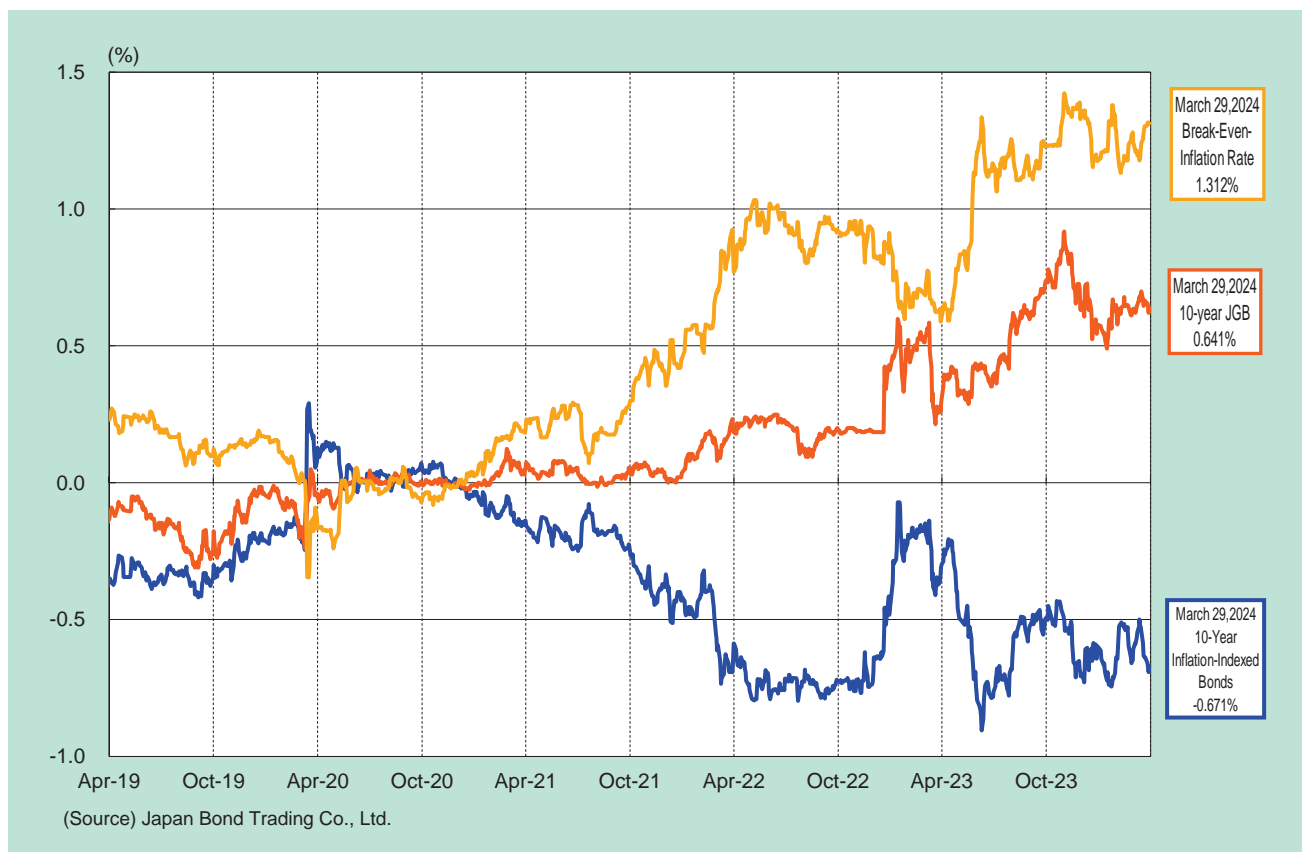


### (3) Yields of JGBs in FY2023

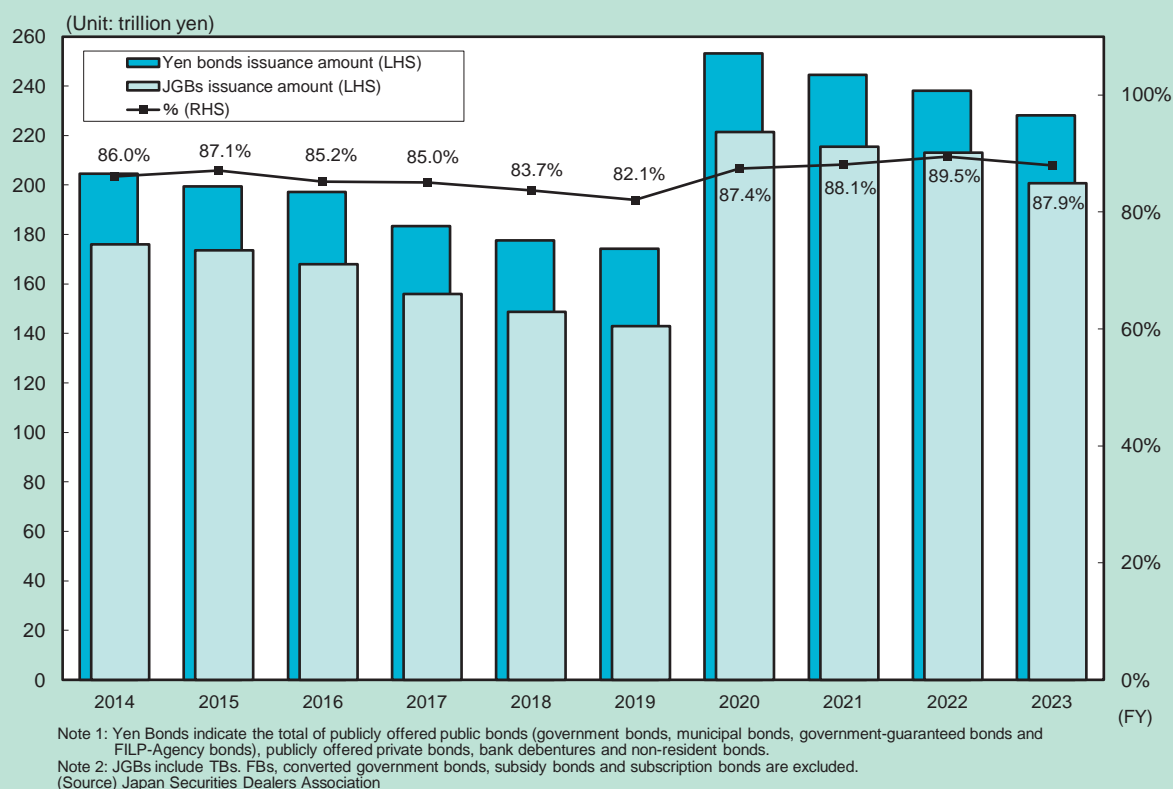


### (4) JGB Yield Curves

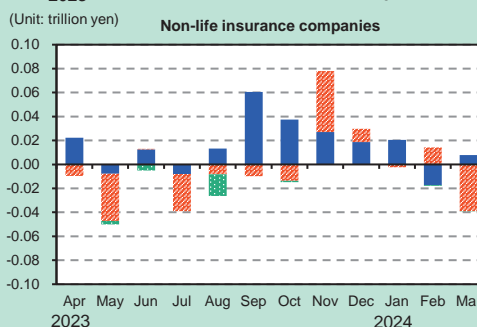
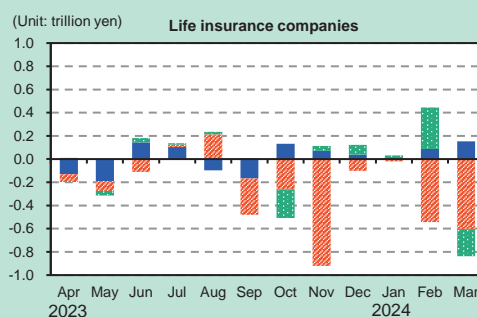
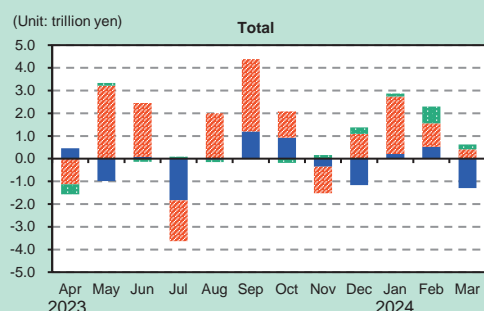
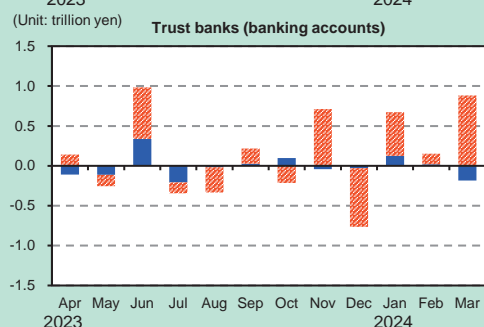
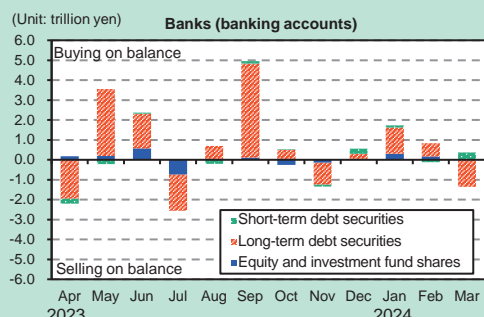


**(5) Various Rates in the Short-term Financial Market in FY2023****(6) Break-Even-Inflation (BEI) Rate**

## (7) JGB Share in Total Issuance Amount of Yen Bonds

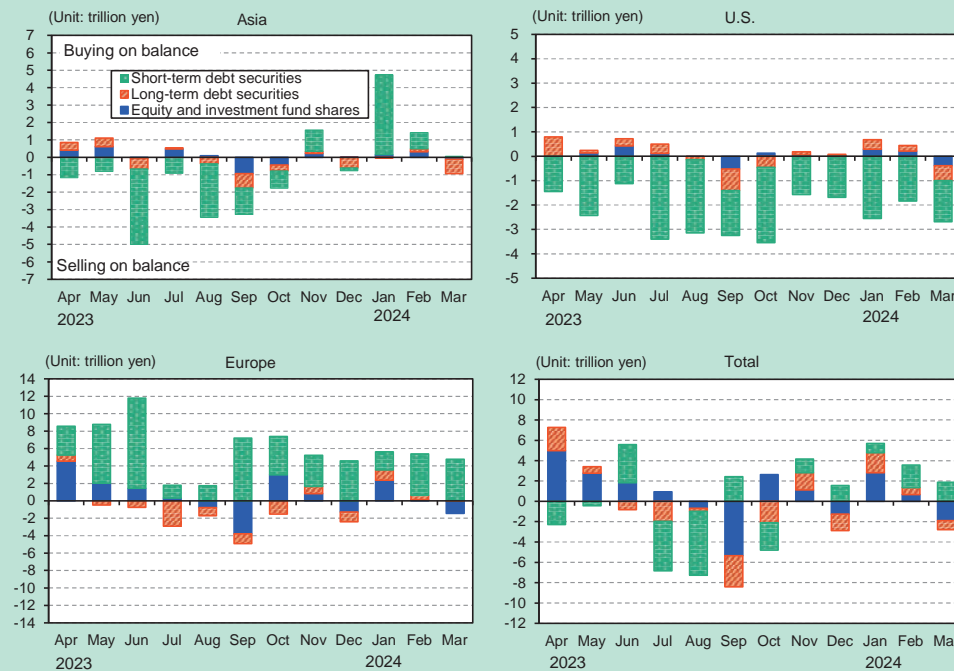


## (8) Portfolio Investment Assets in FY2023



Note 1: Figures indicate the situation of investment by residents in securities issued by non-residents.  
 Note 2: "Long-term debt securities" are securities with an original maturity of more than one year and include central government bonds, government agency securities, supranational bonds, local government bonds, bank bonds, corporate bonds, Samurai bonds, etc.  
 Note 3: "Short-term debt securities" are securities with an original maturity of no more than one year and include T-Bills, commercial papers, etc.  
 Note 4: "Total" includes "General government", "Banks (trust accounts)" and "Trust banks (trust accounts)", etc. in addition to the data shown above.  
 (Source) Ministry of Finance

## (9) Portfolio Investment Liabilities in FY2023



Note 1: Figures indicate the situation of investment by non-residents in securities issued by residents.

Note 2: "Long-term debt securities" are securities with an original maturity of more than one year and include central government bonds, government agency securities, supranational bonds, local government bonds, bank bonds, corporate bonds, and Samurai bonds, etc.

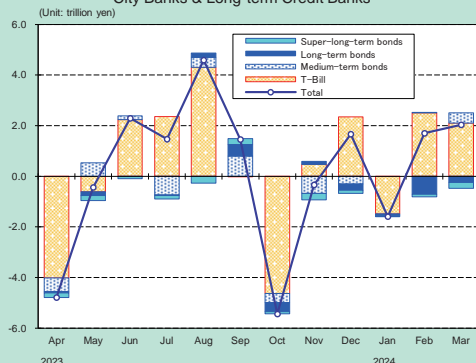
Note 3: "Short-term debt securities" are securities with an original maturity of no more than one year and include T-Bills, commercial papers, etc.

Note 4: "Total" includes "Central and South America", "Oceania" and "Middle East", etc. in addition to the data shown above.

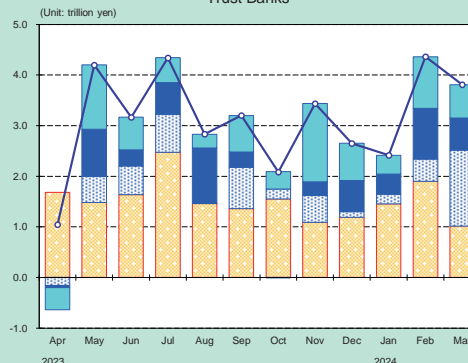
(Sources) Ministry of Finance, Bank of Japan

### (10) Trends in JGB Transactions (by investor type) in FY2023

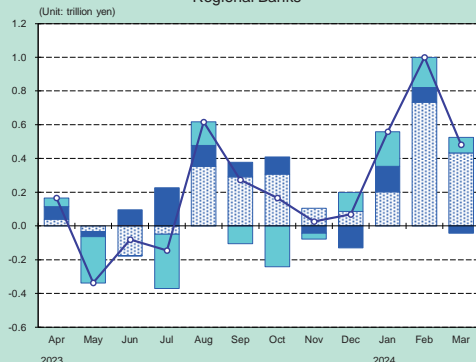
City Banks & Long-term Credit Banks



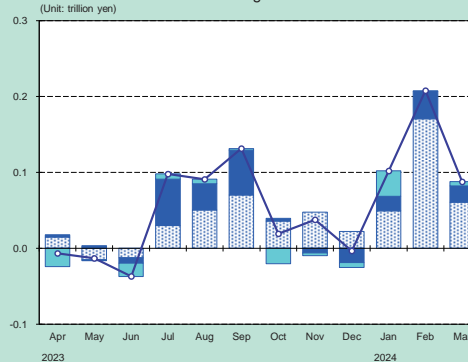
Trust Banks



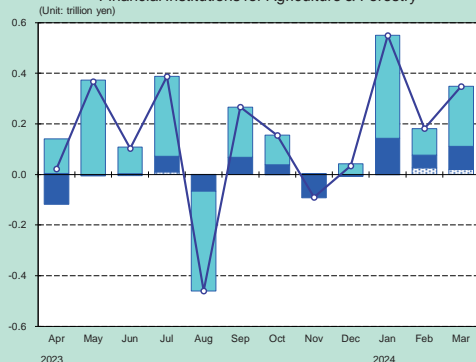
Regional Banks



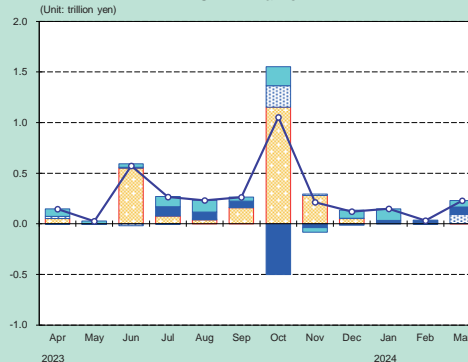
Second-tier Regional Banks



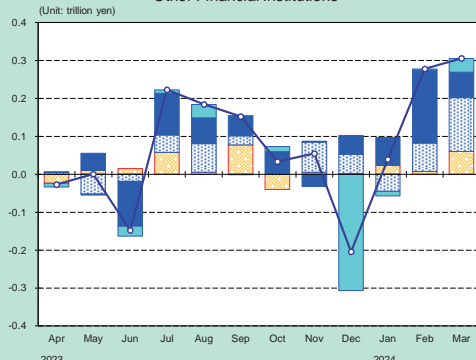
Financial Institutions for Agriculture & Forestry



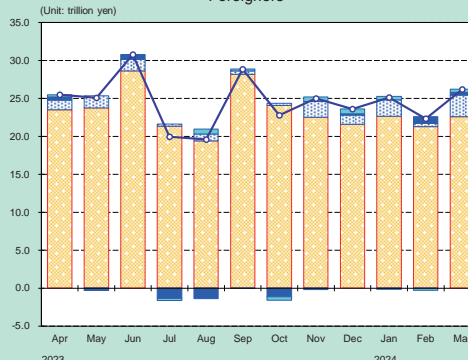
Shinkin Banks



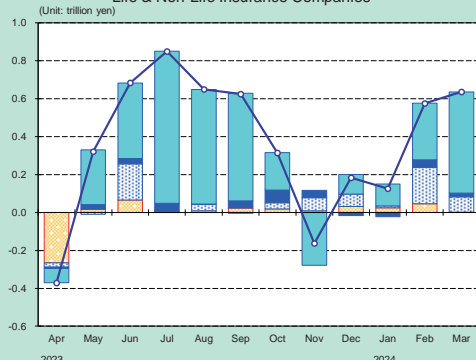
Other Financial Institutions



Foreigners



Life & Non-Life Insurance Companies



Note 1: Turnover figures represent transaction totals (excluding *Gensaki* transactions) by members (securities companies) and special members (registered financial institutions conducting dealing duties, etc.) of the Japan Securities Dealers Association. Figures are calculated on a nominal basis.

Note 2: In addition to the data shown here, the Japan Securities Dealers Association also publishes turnover charts for "Investment Trusts", "Mutual Aid Association of Govt. Offices", "Business Corporations", "Other Corporations", "Individuals", "Others" and "Bond Dealers".

(Source) Prepared by the MOF based on data from the Japan Securities Dealers Association

## (11) Trading Volume of Yen Bonds

	Yen Bonds	(Unit: trillion yen)					JGB Share in Total Trading Volume of Yen Bonds
		JGBs	Super long-term Bonds	Long-term Bonds	Medium-term Bonds	Short-term Bonds	
FY2014	3,440.1	3,386.7	413.5	698.4	999.9	1,274.9	98.4%
FY2015	2,812.6	2,764.0	372.9	641.5	723.9	1,025.7	98.3%
FY2016	2,365.5	2,322.8	389.1	471.5	696.2	766.0	98.2%
FY2017	2,301.2	2,257.1	435.3	498.1	567.1	756.6	98.1%
FY2018	2,285.4	2,242.0	459.3	525.1	495.9	761.7	98.1%
FY2019	2,337.1	2,293.9	439.9	500.0	560.8	793.2	98.1%
FY2020	2,650.4	2,605.6	429.1	441.7	454.9	1,279.9	98.3%
FY2021	2,599.4	2,559.0	469.7	517.9	461.3	1,110.0	98.4%
FY2022	2,931.3	2,898.1	504.1	689.3	527.3	1,177.5	98.9%
FY2023	2,922.2	2,881.7	524.7	564.8	696.0	1,096.1	98.6%

Note: Bond *Gensaki* transactions are excluded.

(Source) Japan Securities Dealers Association

## (12) Trading Volume of JGB Futures

(Unit: trillion yen)

	Trading Volume	Open Interest (End of FY)		10-Year JGB Futures	20-Year JGB Futures
		10-Year JGB Futures	20-Year JGB Futures		
FY2014	904.9	903.9	0.6	8.7	0.0
FY2015	849.7	849.1	0.3	7.2	0.0
FY2016	700.0	699.9	0.0	8.0	0.0
FY2017	881.5	881.5	0.0	11.7	0.0
FY2018	1,027.0	1,026.9	0.0	11.2	0.0
FY2019	955.3	955.3	0.0	6.9	–
FY2020	712.7	712.7	–	7.7	–
FY2021	813.0	813.0	–	9.0	–
FY2022	788.7	788.7	0.0	15.8	–
FY2023	1,018.4	1,018.4	–	18.9	–

Note: Trading in 20-year JGB Futures had been suspended due to little demand but was re-launched based on JGB market conditions and discussions with investors in April 2014.  
(Source) Japan Exchange Group, Inc.(13) Trading Volume of Bond *Gensaki*

(Unit: trillion yen)

	Trading Volume			Outstanding (End of FY)	
	Yen Bonds (excluding JGB baskets)	JGBs	JGB Baskets	Transactions other than Subsequent Collateral Allocation Repos (Standard Repos, etc.)	Subsequent Collateral Allocation Repos
FY2014	7,064.3	7,004.9	–	30.8	–
FY2015	7,582.8	7,486.9	–	30.5	–
FY2016	6,918.4	6,887.5	–	33.4	–
FY2017	7,622.2	7,579.0	–	40.2	–
FY2018	13,575.8	13,537.7	3,112.7	101.6	14.8
FY2019	17,259.1	17,222.5	6,450.2	133.6	22.7
FY2020	18,843.3	18,837.1	9,085.0	120.6	27.8
FY2021	22,791.3	22,777.5	10,326.1	155.9	22.6
FY2022	34,591.9	34,579.9	10,929.3	192.6	22.0
FY2023	43,768.4	43,758.6	9,919.3	240.9	25.8

Note 1: The Outstanding at the end of fiscal year is the total outstanding of securities companies and financial institutions for dealing.

Note 2: JGB Baskets and Subsequent Collateral Allocation Repos are traded price base (otherwise nominal).

(Source) Japan Securities Dealers Association

## (14) Trading Volume of Bond-Lending

(Unit: trillion yen)

	Lending			Borrowings		
		With Collateral	Without Collateral		With Collateral	Without Collateral
FY2014	8,347.4	8,328.5	18.8	6,616.5	6,547.9	68.5
FY2015	8,228.7	8,213.1	15.6	5,809.2	5,736.5	72.7
FY2016	8,547.9	8,535.8	12.1	5,966.5	5,893.2	73.3
FY2017	8,548.4	8,442.5	105.9	5,627.7	5,557.3	70.5
FY2018	5,622.5	5,291.4	331.1	3,601.8	3,518.8	83.0
FY2019	3,090.5	2,781.8	308.7	2,003.5	1,921.6	81.9
FY2020	2,782.6	2,371.9	410.7	1,476.7	1,403.0	73.7
FY2021	2,107.1	1,749.3	357.7	1,305.4	1,233.6	71.8
FY2022	3,011.7	2,587.9	423.8	1,928.9	1,849.7	79.2
FY2023	3,370.2	3,346.2	24.1	2,654.1	2,588.4	65.7

Note: Trading volume is the total of contracts by all members of Japan Securities Dealers Association.  
(Source) Japan Securities Dealers Association

## (15) Trading Volume of JGBs Option by OTC

(Unit: trillion yen)

	Total	Call Options		Put Options	
		Buy	Sell	Buy	Sell
FY2014	102.3	41.5	18.2	19.9	22.6
FY2015	65.8	32.8	9.1	11.3	12.6
FY2016	68.9	26.8	11.8	15.0	15.3
FY2017	97.9	31.2	20.6	22.6	23.6
FY2018	119.6	35.3	28.9	29.9	25.5
FY2019	131.8	36.1	31.7	33.2	30.8
FY2020	81.0	25.1	18.2	18.8	18.8
FY2021	81.4	25.4	18.0	18.4	19.5
FY2022	155.2	42.0	36.7	37.2	39.4
FY2023	380.5	96.0	95.4	96.4	92.7

Note 1: Trading volume is the total transaction of securities companies and financial institutions for dealing.  
Note 2: Trading volume is on nominal basis.  
(Source) Japan Securities Dealers Association



**(16) Trading Volume of JGB Futures Options**

(Unit: trillion yen)

	Trading Volume			Open Interest (End of FY)		
		Call	Put		Call	Put
FY2014	118.7	33.1	85.5	4.5	0.6	3.8
FY2015	102.5	31.3	71.2	0.9	0.2	0.7
FY2016	92.5	28.0	64.5	1.4	0.2	1.2
FY2017	86.2	30.2	56.1	1.6	0.5	1.1
FY2018	70.9	25.7	45.2	0.9	0.3	0.6
FY2019	64.4	31.1	33.4	0.0	0.0	0.0
FY2020	24.6	11.7	12.9	0.1	0.0	0.1
FY2021	16.0	7.5	8.5	0.1	0.1	0.0
FY2022	7.6	3.1	4.4	0.1	0.0	0.1
FY2023	8.5	2.7	5.8	0.1	0.0	0.1

(Source) Japan Exchange Group, Inc.

**(17) Outstanding Amount of STRIPS-Principal-Only Book-entry Transfer JGBs**

(Unit: billion yen)

	40-Year Bonds		30-Year Bonds		20-Year Bonds		10-Year Bonds		10-Year Japan Climate Transition Bonds		5-Year Bonds		5-Year Japan Climate Transition Bonds		2-Year Bonds		Total	
FY2014	39.6	(10,445.5)	143.3	(64,211.4)	24.5	(157,000.2)	138.5	(298,055.7)	—	(—)	16.6	(158,260.0)	—	(—)	—	(69,152.9)	362.6	(757,125.7)
FY2015	49.6	(13,133.4)	146.4	(76,987.9)	23.9	(174,841.3)	119.3	(301,008.5)	—	(—)	12.1	(160,806.5)	—	(—)	—	(63,932.8)	351.3	(790,710.4)
FY2016	49.6	(16,597.6)	146.4	(88,628.2)	20.7	(192,056.6)	94.4	(302,813.6)	—	(—)	6.5	(160,409.4)	—	(—)	—	(60,419.9)	317.5	(820,925.1)
FY2017	49.6	(20,283.7)	146.4	(100,696.1)	20.6	(208,335.0)	66.4	(308,203.8)	—	(—)	3.6	(156,681.3)	—	(—)	—	(57,975.4)	286.7	(852,175.2)
FY2018	49.6	(23,191.4)	146.4	(111,350.1)	20.6	(226,008.7)	46.1	(314,323.3)	—	(—)	1.2	(147,403.4)	—	(—)	—	(55,436.4)	263.9	(877,713.3)
FY2019	49.7	(26,504.6)	146.4	(121,641.1)	20.6	(243,077.3)	23.0	(313,956.3)	—	(—)	0.4	(138,030.0)	—	(—)	—	(52,360.6)	240.0	(895,569.8)
FY2020	49.7	(30,453.0)	146.4	(133,637.9)	20.6	(261,715.0)	13.9	(316,538.4)	—	(—)	—	(135,198.7)	—	(—)	—	(60,130.9)	230.6	(937,673.9)
FY2021	49.9	(35,098.5)	146.4	(146,955.0)	20.6	(281,354.0)	6.0	(320,319.2)	—	(—)	—	(136,099.3)	—	(—)	—	(71,542.0)	222.8	(991,368.0)
FY2022	50.2	(40,240.8)	146.4	(160,036.2)	20.4	(296,896.8)	3.5	(323,874.0)	—	(—)	—	(138,002.0)	—	(—)	—	(73,629.5)	220.4	(1,032,679.4)
FY2023	50.3	(45,406.6)	146.4	(173,148.9)	20.2	(305,062.0)	1.9	(325,247.3)	—	(799.5)	—	(144,683.3)	—	(799.8)	—	(72,241.6)	218.8	(1,067,389.1)

&lt;key&gt; Outstanding Amount of Principal-Only Book-entry Transfer JGBs at the end of each period (Outstanding amount of JGBs qualified for STRIPS)

Note: Figures may not sum up to the total because of rounding.

## (18) Japan's Sovereign Rating by Major Credit Rating Agencies

(Long-term debt denominated in home currency on May 22, 2024)

Moody's	S&P	Fitch	R&I	JCR
Nov. 17, 98 Aaa Sep. 8, 00 Aa1 Dec. 4, 01 Aa2 May 18, 09 Aa3 Jun. 30, 08 A1 May 31, 02 A2 Oct. 11, 07 A3 Baa1 Baa2 Baa3	Feb. 22, 01 AAA Nov. 27, 01 AA+ Apr. 15, 02 AA Apr. 22, 07 AA- Jan. 27, 11 A+ Sep. 16, 15 A A- BBB+ BBB BBB-	Jun. 29, 00 AAA Nov. 26, 01 AA+ Nov. 21, 02 AA May 22, 12 A+ Apr. 27, 15 A A- BBB+ BBB BBB-	Dec. 21, 11 AAA AA+ AA AA- A+ A A- BBB+ BBB BBB-	Oct. 31, 00 AAA AA+ AA AA- A+ A A- BBB+ BBB BBB-

### [Outlook]

Stable (Dec. 1, 2014)	Stable (Jun. 9, 2020)	Stable (Mar. 25, 2022)	Stable (Aug. 30, 2018)	Stable (Aug. 9, 2018)
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## (19) List of Sovereign Ratings by Major Credit Rating Agencies

(Long-term debt denominated in home currency on May 22, 2024)

	Moody's	S&P	Fitch	R&I	JCR
Aaa/AAA	U.S. (↓) Germany Canada	Germany Canada	Germany	U.S. U.K. Germany France	Japan U.S. U.K. Germany France Canada
Aa1/AA+		U.S.	U.S. Canada	Japan	Korea
Aa2/AA	France Korea	U.K. France (↓) Korea Ireland			Spain China
Aa3/AA-	U.K. Ireland		Korea Ireland (↑) U.K. France	China Korea Ireland (↑)	
A1/A+	Japan China (↓)	Japan China	China (↓)		
A2/A		Spain	Japan	Spain	Italy Portugal
A3/A-	Portugal	Portugal (↑)	Spain Portugal		
Baa1/BBB+	Spain (↑)			Italy Portugal	
Baa2/BBB		Italy	Italy		
Baa3/BBB-	Italy	Greece (↑)	Greece	Greece	
Ba1/BB+	Greece				
Ba2/BB					
Ba3/BB-					
B1/B+					
B2/B					
B3/B-					
Caa1/CCC+					
Caa2/CCC					
Caa3/CCC-					
Ca/CC					
C					
SD/RD					

" (↑) "shows that the outlook is positive.  
" (↓) "shows that the outlook is negative.