

CHAPTER X

Financial Instruments Exchange, etc. (1)

1. The Function of the Financial Instruments Exchanges

The basic function of a financial instruments exchange is to establish a market and concentrate supply and demand of marketable securities in a single market to enhance the liquidity of securities, to help form fair prices that reflect supply and demand, and to promptly publish the prices thus formed. The purpose of a financial instruments exchange is to establish a market for trading securities and executing exchange derivatives trading and to run the market in such a way as to facilitate fair and efficient trading in the public interest and for the protection of investors. The basic mission of the financial instruments exchange is to provide a fair and transparent market. The market established by a financial instruments exchange has the function of providing a marketplace that enhances the liquidity of financial instruments and helps form fair prices so as to provide investors with an environment in which investors can conduct investment activities free from anxiety, raise funds smoothly by issuing securities, and hedge risks by executing exchange derivatives trading among other activities. Furthermore, prices formed on an exchange can serve as a base for assessing the asset value of securities among others and price indexes serve as an important indicator of economic and business trends. Because financial instruments markets operated by exchanges perform an important role in supporting the economy of the nation, a license must be obtained from the prime minister to open an exchange, and the operation of that exchange is placed under supervision according to the Financial Instruments and Exchange Act.

Stock exchanges were conventionally required to be membership organizations under the Securities and Exchange Act. An amendment of that law that went into effect in 2000, however, allowed stock exchanges to change their legal status to that of a corporation. Starting with Osaka in 2001, the Tokyo, Nagoya, and JASDAQ exchanges became corporations. The enforcement of the Financial Instruments and Exchange Act in 2007 provided for the establishment of an exchange holding company, self-regulatory organization, etc. Given this law, in the same year, the Tokyo Stock Exchange Group, Inc.

Chart X-1. The Function of the JPX-operated Financial Instruments Exchanges

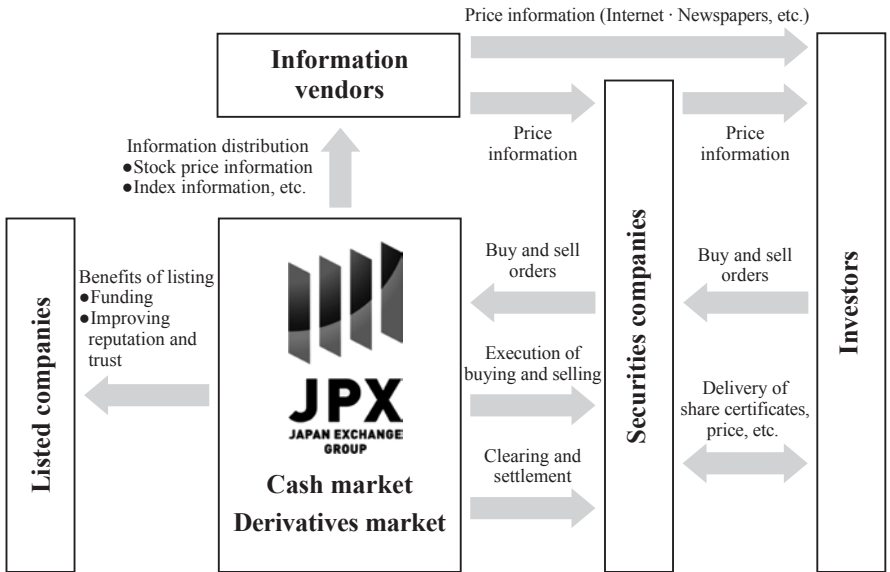
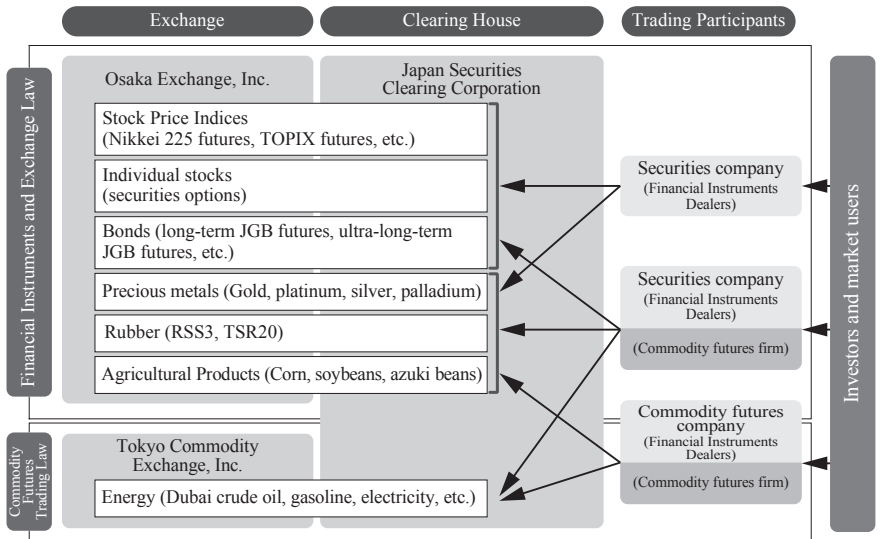


Chart X-2. Overview of Comprehensive Exchange



was established as a holding company of the Tokyo Stock Exchange and a self-regulatory organization. The establishment of a holding company was prompted by potential conflicts of interest between the public role of an exchange as an operator of self-regulating operations and the for-profit orientation of an exchange as a corporation, where exchanges sought to reinforce the independence of their highly public function to ensure self-regulation of the market. Furthermore, against the backdrop of intensifying competition among markets across borders resulting from the advancement of financial transaction systems, in 2013, the Tokyo Stock Exchange Group and the Osaka Securities Exchange combined their operations to increase the appeal and convenience of their markets and to enhance their global competitiveness, forming the Japan Exchange Group (JPX).

In 2019, JPX acquired Tokyo Commodity Exchange (TOCOM), and in 2020 it transferred trading in precious metal futures and other commodities from TOCOM to Osaka Exchange (OSE), which specializes in derivatives, and integrated clearing organizations under its umbrella to create a comprehensive exchange for trading a wide range of products from financial instruments to commodities.

2. Footsteps of Markets

When the stock exchange resumed trading after WW2, the exchange market was a single market. With the Japanese economy entering a period of high growth and the demand for capital from small and medium-sized enterprises increasing, the OTC transactions executed outside the stock exchange rapidly evolved into a marketplace for so-called “collective transactions”. It became necessary to institutionalize the marketplace to encourage the development of the SMEs and to protect investors. In 1961, the Tokyo, Osaka and Nagoya Stock Exchanges set up Second Sections that have more relaxed listing standards than the conventional market, thereby absorbing many of the shares which had previously been traded OTC. This is the origin of the First Section and the Second Section of the Tokyo Stock Exchange (prior to the April 2022 review of market segments). Following this, new listing companies were designated on the Second Section. However, with the initial listing of Nippon Telegraph and Telephone Corporation (NTT) in 1986, part of designation standards was revised, enabling certain companies with a large number of listing shares and likelihood for exceptionally favorable shareholder base to be designated on the First Section. In 1996, with the objective of clarification, the standards for listing directly on the First Section were formalized, which required a certain number of listing shares and the shareholder base conformable to the First Section designation standards.

Table X-1. History of the TSE’s First and Second Sections

Apr. 1949	Stock Exchange reopened
Oct. 1961	The Second Section of the market opened in Tokyo, Osaka and Nagoya Establishment of listing criteria for shares designated to be listed on the First Section and those re-designated to be listed on the Second Section
Nov. 1986	Revision of regulations concerning the listing of NTT shares • Certain companies with a large number of listing shares and the likelihood for exceptionally favorable shareholder base could be directly designated as First Section stocks.
Nov. 1996	Standards for listing directly on the First Section formalized for clarification purposes • Number of listing shares, shareholder base (conformable to the First Section designation standards), etc.

Table X-2. History of the JASDAQ

Nov. 1983	New over-the-counter (OTC) market launched.
Dec. 1998	The JASDAQ market defined as an OTC securities market (in parallel with other exchange markets).
Dec. 2004	Stock exchange license acquired by JASDAQ and by the Securities and Exchange Act its name changed to the JASDAQ Securities Exchange.
Aug. 2007	The NEO market established.
Oct. 2007	JASDAQ, NEO, and Hercules markets merged, forming the new JASDAQ market.
July 2013	The businesses of TSE and OSE combined, with the TSE continuing to operate JASDAQ.

Table X-3. History of the Mothers

Nov. 1999	Mothers launched.
May 2002	Listing criteria reviewed: • Newly establish delisting criteria regarding sales. • Newly establish listing screening standards and delisting criteria regarding market capitalization, etc.
Dec. 2006	The first phase of a comprehensive listing system improvement program undertaken. • Require new applicants to obtain a letter of recommendation from the managing underwriter.
Nov. 2007	The second phase of a comprehensive listing system improvement program undertaken. • Abolish provisions for moving from main exchange to Mothers market (clarify Mothers’ position as a start-up market), etc.
Nov. 2009	Steps taken to improve confidence in market taken. • Newly establish “appropriateness of business plan” as a listing criteria. • Newly establish stock price related delisting criteria, etc.
Mar. 2011	Further steps to improve confidence in and stimulate market taken. • Require listed companies to be audited by an audit firm registered with exchange. • Newly establish requirement to choose whether to stay on Mothers after 10 years. • Introduce listing screening policy in line with market concept (confirm appropriateness of business plan). *History prior to the restructuring of TSE market segments (April 2022)

Amid Japan's high economic growth, the Japan Securities Dealers Association (JSDA) introduced the OTC Registration System in 1963 to provide a marketplace to secure funding for those companies that lack listing opportunities on the exchange markets. The OTC Registration System was reorganized into the new OTC Stock Market in 1983 and served to complement the conventional stock exchanges as a capital market for growth and start-up companies. After the revision of the Securities and Exchange Act in 1998, the OTC Stock Market was redefined so that it exists in parallel with other exchange markets in its own right. In 2004, it became the JASDAQ Securities Exchange, which was subsequently merged with the OSE-operated Hercules in 2010. Following the management integration of the TSE and the OSE, the exchange has been operated as the TSE JASDAQ market since July 2013.

In 1999, TSE established the Mothers market to provide listing opportunities for emerging companies in their start-up growth phase. This new market offered improved protection for investors through enhanced disclosure requirements, while allowing companies with high growth prospects to get listed even if they had negative net worth or suffered pretax losses. Subsequently, after a set of scandals among some of the listed companies, the screening criteria for listing were tightened to improve investor protection. Consequently, in 2011, TSE undertook a review of the Mothers' listing system (including changes to the method of reviewing listings to assess whether or not company business plans were reasonable) from the perspective of improving credibility and stimulating activity on the market.

Subsequently, in April 2022, the TSE carried out a review of market segments as its first major reform in around 60 years since the establishment of the Second Section (see the next section for details).

3. Review of TSE market segment

Previously, the TSE operated four markets for general investors: the First Section, the Second Section, Mothers and JASDAQ (Standard and Growth). This market structure reflected the fact that when TSE and OSE merged in 2013, they maintained their respective structures so as to minimize the impact on listed companies and investors. In recent years, however, it has become evident that there is room for improvement in certain areas. Accordingly, in 2018, TSE canvassed opinion on various issues related to market structure and the future direction of the market. Specifically, market participants raised the following points: (1) many investors find the concept of each market segment unclear and confusing; (2) the market is not fully fulfilling its expected role in terms of incentivizing listed companies to sustainably increase their corporate value, and (3) there is no index that functions properly

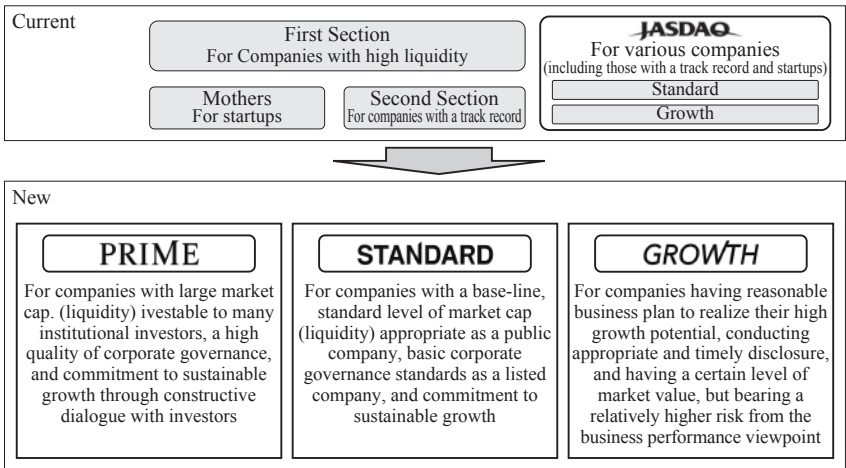
Chart X-3. Major Issues regarding TSE Cash Equity Market Structure

- 1. Ambiguous market concept impairing convenience of investors & losing attractiveness
 - ✓ Concerns that market concept of the 2nd Section, Mothers, and JASDAQ overlap and confusing
 - ✓ Concerns that market concept of the 1st Section is unclear, and the growth of TOPIX-linked passive investment is affecting price formation of issues with relatively low liquidity
- 2. Insufficient incentives for listed companies to sustainably grow and increase corporate value
 - ✓ Concerns that listing criteria for “step-up” to the 1st Section is not functioning sufficiently to incentivize growth
 - ✓ Concerns of insufficiency of market participation by institutional investors Mothers and JASDAQ and of the disclosed information of start-up companies
- 3. There is no index available that is not only good for investment but also well representing the whole market
 - ✓ TOPIX, widely used by investors as a benchmark is comprised of all stocks listed on the 1st Section
 - ✓ Few investors use JPX Nikkei 400 nor TOPIX 500 as a benchmark stocks



For the Japanese economy to continue growing, it is imperative and urgent that listed companies increase their corporate value over the medium-to-long term and many start-up companies grow

Chart X-4. Restructuring the Market Segments with a clear market concept



as a benchmark investable index.

Based on these issues, from April 4, 2022, the market has been reorganized into three new segments: Prime, Standard, and Growth, in order to provide a market that incentivizes sustainable growth and mid-to long-term corporate value creation of listed companies and attracts various types of investors, both domestic and foreign.

Listing requirements for each new market segment set quantitative and qualitative criteria for liquidity, corporate governance and others in accordance with each market concept. In principle, the same criteria shall apply to both initial listing and listing maintenance for each segment, and therefore listed companies will be required to comply with the standards of the initial listing criteria on a continuous basis after listing. Each market segment is independent, and thus are no special lowered requirements for transfer between segments, as is the case so far. Therefore, when a listed company changes its market segment, it is required to undergo a new examination based on the same criteria as the initial listing criteria of the market segment to which it is changing, and to comply with those criteria.

In addition to the abovementioned review of market segments, TOPIX, currently comprised of all companies listed on the First Section, is also being reviewed with the aim of further improving not only how well it represents the market but also its functionality as an investable index.

4. Initial Listing System

The TSE imposes initial listing requirements on each market segment from the viewpoint of investor protection and examines listing applications to see whether they satisfy the listing requirements. TSE's initial listing criteria for each market segment comprise quantitative (formal) and qualitative (eligibility) requirements and the TSE examines applications from companies wishing to be listed based on consultation and their submitted documents.

Prime Market: In terms of the formal requirements, “tradable share market capitalization of at least ¥10 billion” which ensures the basis for ample liquidity so that a variety of institutional investors can invest in a company with confidence; “tradable share ratio of at least 35%” which is the basis for ensuring an effective foundation for constructive dialogue with institutional investors; either ¥2.5 billion profit (total of previous two years) or sales of at least ¥10 billion and notional market capitalization of at least ¥100 billion which are the basis for a stable and excellent revenue/financial base. In terms of the qualitative requirements, criteria are set from the viewpoint of corporate continuity, profitability, corporate governance, and effectiveness of internal control systems.

Table X-4. Initial Listing Criteria (Quantitative Requirements)

Items		Prime Market	Standard Market	Growth Market
Liquidity	Number of Shareholders	800 or more	400 or more	150 or more
	Tradable Shares	20,000 units or more	2,000 units or more	1,000 units or more
	Market capitalization of the tradable share	JPY 10 billion or more	JPY 1 billion or more	JPY 0.5 billion or more
	Market Capitalization	JPY 25 billion or more	—	—
Governance	The number of tradable shares	35% or higher of the listed stocks	25% or higher of the listed stocks	25% or higher of the listed stocks
Operating results	Revenue base	The applicant company satisfies either of the following a. or b.: Aggregated profits over the last two years are JPY 2.5 billion or more Net sales over the last year are JPY 10 billion or more and market capitalization is estimated to be JPY 100 billion or more at time of listing	Total profits over the last year are JPY 0.1 billion or more	—
Financial conditions		The amount of consolidated net assets is JPY 5 billion or more and amount of unconsolidated net assets is a positive figure	The amount of consolidated net assets is a positive figure	—
Public Offering		—	—	500 trading units or more
Others		Years of Business Operation, False Statements or Adverse Opinions, etc., Audit by a Listed Company Audit Firm, Establishment of a Shareholder Services Agent, Share Unit, Classes of Stock, Restriction on Transfer of Shares, Handling by the Designated Book-Entry Transfer Institution, etc.		

- Notes:* 1. No. of shareholders means the number of shareholders who own one or more units of shares.
2. The number of “tradable shares” is the number of shares after deducting from the number of listed shares the shares owned by shareholders, directors, etc., who own 10% or more of the listed shares, treasury (if they own their own shares), domestic common banks, insurance companies, and business corporations, and other shares deemed fixed by the Exchange.
3. The amount of profits is the amount derived by adding or subtracting net income attributable to minority interests in subsidiaries to/from the amount of current profit (loss).
4. Not required where the market capitalization on the listing date is expected to be JPY 25 billion or more.
5. Refers to registered auditors of listed companies, etc. as defined in Article 34-34-8, paragraph 1 of the Certified Public Accountants Act (limited to those who have undergone quality control reviews by the Japanese Institute of Certified Public Accountants).

Table X-5. Initial Listing Criteria (Qualitative Requirements)

Prime Market	Standard Market	Growth Market
<p>【Corporate Continuity and Profitability】 The applicant company is operated continuously and has a stable and excellent revenue base.</p>	<p>【Corporate Continuity and Profitability】 The applicant company is operated continuously and has a stable revenue base.</p>	<p>【Appropriateness of Disclosure of Corporate Information, Risk Information, etc.】 The applicant company is in a position to appropriately disclose its business details and risk information, etc.</p>
<p>【Soundness of Corporate Management】 The applicant company carries out its business fairly and faithfully.</p>	<p>【Soundness of Corporate Management】 The applicant company carries out its business fairly and faithfully.</p>	<p>【Soundness of Corporate Management】 The applicant company carries out its business fairly and faithfully.</p>
<p>【Effectiveness of Corporate Governance and Internal Management System】 Corporate governance and internal management systems are appropriately established and functioning.</p>	<p>【Effectiveness of Corporate Governance and Internal Management System】 Corporate governance and internal management systems are appropriately established and functioning.</p>	<p>【Effectiveness of Corporate Governance and Internal Management System】 Corporate governance and internal management systems that are commensurate with the size and maturity of the company are appropriately established and functioning.</p>
<p>【Appropriateness of Disclosure of Corporate Information, etc.】 The applicant company is in a position where it is able to disclose its corporate information appropriately.</p>	<p>【Appropriateness of Disclosure of Corporate Information, etc.】 The applicant company is in a position where it is able to disclose its corporate information appropriately.</p>	<p>【Reasonableness of the business plan】 The applicant company has established a rational business plan and built a business foundation necessary to execute the business plan or has a rational plan to do so.</p>
Other matters deemed necessary by the Exchange from the viewpoint of public interest or investor protection		

Standard Market: The formal requirements include a “tradable share market capitalization of at least ¥1 billion” as the basis for appropriate liquidity for smooth trading by general investors; “a tradable share ratio of at least 25%” to ensure minimum publicness as a listed company; and “profit at least ¥0.1 bn. in the most recent year” as the criterion for a stable revenue base. In terms of the qualitative requirements, similar to the Prime Market, there is the perspective of corporate continuity and profitability. However, while the Prime Market requires a stable and excellent revenue base, the Standard Market only requires a stable revenue base.

Growth market: In terms of formal requirements, the minimum liquidity requirement for a company to be investable for general investors is a “tradable shares market capitalization of at least ¥500 million,” “a tradable share

ratio of 25% or more” for ensuring a minimum publicness as a listed company and “public offering of at least 500 units at initial listing” as a necessary fund raising to achieve growth.

To widely accept start-up companies to the capital market, there are no criteria related to past business performance or financial position (profit and net assets). In terms of qualitative requirements, companies are required to demonstrate reasonable business plan to realize high growth and to have ability to conduct appropriate disclosure.

5. Listing Administration Systems

With a view to carrying out the proper administration of listed securities and to protecting investors, stock exchanges have instituted various rules relating to the administration of listings and have sought to ensure the effectiveness of these rules by requiring issuers to commit to observe these in the listing agreement they sign at the time of listing. TSE’s listing requirements include rules for timely disclosure of important corporate information, a code of corporate conduct requiring companies to adhere to appropriate behavior, and the delisting of securities.

Rules Requiring Timely Disclosure of Corporate Information: To ensure the formation of fair market prices and to foster the sound development of a financial instruments market, it is extremely important for listed companies to make proper disclosure in a timely manner of information concerning important corporate matters that may influence the investment decision-making of investors, the very basis on which stock prices are formed.

TSE requires listed companies to disclose important corporate information, such as corporate decisions, events, and financial results, in a timely manner. The timely disclosure requirements are fundamentally the same through all the market segments, but the only Growth Market requires companies to disclose “business plans and matters relating to growth potential” on a continuous basis.

Code of Corporate Conduct: The Tokyo Stock Exchange has introduced a code of corporate conduct. The multifold purposes of requiring proper conduct by listed companies are to raise awareness of their role as members of the financial instruments market, to ensure greater transparency by enhancing the disclosure of corporate information, and to achieve the proper operation of investor protection measures and market functions.

Continued listing criteria; delisting criteria: Under the new market segments each market has its own continued listing criteria based on the respective concept and listed companies are required to comply with these criteria on a continuous basis. If a company is in breach of the criteria and fails to

Table X-6. Outline of Code of Corporate Conduct of the Tokyo Stock Exchange

Matters to be observed (if a listed company violates a provision regarding these matters, it may be subject to measures enforced by the TSE)	Matters desired to be observed (listed companies are expected to make efforts to observe them)
<ul style="list-style-type: none"> • Matters to be observed regarding third-party allotment • Prohibition of stock split, etc., that could cause turmoil in the secondary market • Matters to be observed pertaining to issuance of MSCB, etc. • Duty to exercise of voting rights in writing, etc. • Duty to carry out framework improvement to facilitate exercise of voting rights for listed foreign companies • Duty to secure an independent director/auditor • Duty to explain the reasons for implementing or not implementing the Corporate Governance Code • Duty to appoint a board of directors, an audit board or committee, and an accounting auditor • Duty to select a certified public accountant or public audit firm to provide the audit certificate of the accounting auditor • Duty to carry out necessary structural development of a system for ensuring the appropriateness of business • Matters to be observed pertaining to introduction of takeover defense measures • Matters to be observed pertaining to disclosure of MBOs, etc. • Matters to be observed pertaining to significant transactions, etc., with controlling shareholders • Prohibition of insider trading • Exclusion of anti-social forces • Prohibition of behavior destructive to the functioning of the secondary market or the rights of shareholders 	<ul style="list-style-type: none"> • Efforts toward the shift to and maintenance of the desired investment unit level • Respect for the principles of the Corporate Governance Code • Securing management structure that includes independent directors • Framework improvement to enable proper functioning of independent directors/auditors • Provide information on independent directors/auditors, etc. • Framework improvement to facilitate exercise of voting rights • Delivery of documents to shareholders owning stock without voting rights • System improvement for prevention of occurrence of insider trading • Development of system, etc. for excluding anti-social forces • Development of systems and structures to properly respond to changes in accounting standards, etc. • Fair provision of supplementary explanatory materials on details of account settlement

remedy this within the required period, the company will be delisted. In addition to these criteria, there are other criteria common to all the markets.

Regarding the continued listing criteria, less rigorous standards are applied on a transitional basis to companies that were listed prior to the market segmentation review. From March 2025, however, the original continued listing criteria will apply.

When any stock is in danger of falling within the purview of the delisting criteria the stock shall be put on the watch list to notify general investors. When any stock actually falls within the purview of the delisting criteria, the stock shall be put on the liquidation list to publicize the information and allow the trading of such stock to continue for a specified period. After this period, the stock shall be delisted.

Table X-7. Continued Listing Criteria

Item		Prime Market	Standard Market	Growth Market
Liquidity	Number of Shareholders	800 or more	400 or more	150 or more
	Number of tradable shares	20,000 units or more	2,000 units or more	1,000 units or more
	Market capitalization of the tradable share	JPY 10 billion or more	JPY 1 billion or more	JPY 0.5 billion or more
	Trading Value	Daily average trading value: JPY 20 million or more	Monthly average trading volume: 10 units or more	Monthly average trading volume: 10 units or more
Governance	Tradable share ratio	35% or higher	25% or higher	25% or higher
Financial conditions	Amount of Net Assets	The amount of net assets is a positive figure.	The amount of net assets is a positive figure.	The amount of net assets is a positive figure.
Market Capitalization		—	—	JPY 4 billion or more (applicable after 10 years from initial listing)

Note: Improvement period is generally one year. (Standard Market and Growth Market trading criteria is 6 months.)

Table X-8. Delisting Criteria

Item	
Failure to Meet Continued Listing Criteria	lack of entrustment to a shareholder services agent
Suspension of bank transactions	restrictions on transfer of shares
bankruptcy/rehabilitation/reorganization proceedings	conversion to a wholly-owned subsidiary
suspension of business activities	ceasing to be subject to the book-entry transfer operation of a designated book-entry transfer institution
inappropriate merger, etc.	inappropriate restrictions on shareholders' rights
impairment of sound transactions with a controlling shareholder	acquisition of all shares
Delay in Submission of Securities Report or Quarterly Securities Report	acquisition by request for sale of shares, etc.
False Statement or Adverse Opinion, etc.	share consolidation
Securities on Alert, etc.	involvement of anti-social forces
Violation of Listing Agreement, etc.	others (cases where delisting is deemed appropriate for public benefits or investor protection)

6. The Corporate Governance Code

Outline of the Corporate Governance Code: The TSE formulated the Corporate Governance Code “(the Code)”, a set of key principles that contribute to the realization of effective corporate governance of listed companies, which has been applied to the listed companies since June 2015.

The Code consists of a three-layered structure of general principles, principles, and supplementary principles, and adopts the “comply-or-explain” approach. Implementation of each principle is not uniformly required. However, if there is a principle that is not implemented due to the individual circumstances of the company, the company is required to provide an appropriate explanation of the reasons for this and the status of implementation of alternative measures. The Code has been formulated on a principles-based approach. Although there are no clear definitions of terms, it is expected that those involved will interpret the Code and respond to it appropriately in accordance with the intention and spirit of the Code. All listed companies are requested to document their status of adoption of the Code in a Corporate Governance Report. The reports are to be made available for public inspection on the websites of the relevant stock exchanges, etc.

Apart from the Corporate Governance Code, which is a code of conduct for listed companies, the Stewardship Code has been formulated for institutional investors, and it is expected that the two will work together to promote the sustainable growth of listed companies based on constructive dialogue with institutional investors. In addition, in 2018, as an annex to both codes, the “Guidelines for Dialogue between Investors and Companies” was formulated, which summarizes matters that are expected to be discussed intensively

Chart X-5. Two codes and dialogue guidelines

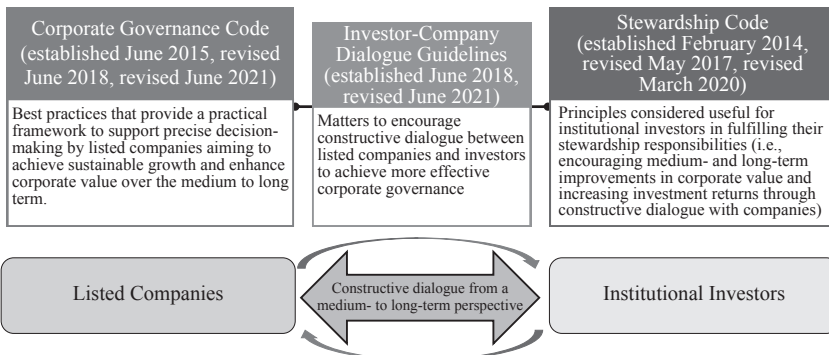


Chart X-6. Overview of the Corporate Governance Code

<p>[1. Securing the Rights and Equal Treatment of Shareholders] Companies should take measures to fully secure rights and equal treatment of shareholders.</p> <ul style="list-style-type: none"> ➤ Securing the substantial Rights and Equal Treatment of Shareholders ⇒ Measures for giving shareholders sufficient time to consider the agenda of general shareholder meetings (early delivery of convening notices, electronic exercise of voting rights, english translation of notice of convocation, etc.) ➤ Description of capital policies ⇒ Basic policy, takeover defense measures and changes in controlling rights, necessity and rationale for large-scale dilution, and cross-shareholdings* etc. *Cross-shareholdings: disclosure of policy for reducing cross- shareholdings, explanation of the objective and rationale for shareholding based on an examination of economic rationale, establishment and disclosure of standards for the exercise of voting rights
<p>[2. Appropriate Collaboration with Stakeholders Other Than Shareholders] Companies should recognize that their sustainable growth is brought about as a result of contributions made by a variety of stakeholders, including employees, customers, business partners, and local communities, and should endeavor to appropriately cooperate with these stakeholders.</p> <ul style="list-style-type: none"> ➤ Appropriate response to issues surrounding sustainability, including social and environmental problems ➤ Ensure diversity in the company's core human resources (women, foreigners, mid-career hires)
<p>[3. Ensure Appropriate Information Disclosure and Transparency] Listed companies are required to appropriately disclose financial and non-financial information in compliance with the relevant laws and regulations, and should also proactively engage in providing other information, thereby providing information that is easy for users to understand and highly useful.</p> <ul style="list-style-type: none"> ➤ Enhancement of Information Disclosure ⇒ Business strategies, Plan, basic principle on corporate governance, policy and procedure of nomination and remuneration of directors, English disclosure, and activities for sustainability
<p>[4. Responsibilities of the Board] In order to promote sustainable corporate growth and enhance earnings power and capital efficiency, the board should appropriately fulfill the following roles and responsibilities:</p> <ol style="list-style-type: none"> (1) Setting the broad direction of corporate strategy; (2) Establishing an environment where appropriate risk-taking by the senior management is supported; and (3) Carrying out effective oversight from an independent and objective standpoint <ul style="list-style-type: none"> ➤ Use of independent/external directors ⇒ At least one-third of the directors (prime Market listed companies) or two of the directors (other market listed companies) to be those who are qualified to contribute to sustainable growth, exclusive meetings for independent directors, lead independent directors, proper involvement in nomination and compensation, etc. ➤ Ensuring the effectiveness of the board of directors and the audit & supervisory board ⇒ Evaluation of effectiveness of the board of directors, management of directors' meetings (distribution of materials, matters to be discussed, etc.), access to information (streamlining of the company's support system, provision of opportunities for training, etc.)
<p>[5. Dialogue with Shareholders] In order to contribute to sustainable growth, companies should engage in constructive dialogue with shareholders.</p>

Source: Materials released by the Financial Services Agency.

in the dialogue between companies and investors.

Revision of Corporate Governance Code: The Corporate Governance Code was revised in 2018, and again in June 2021. The three main points of the 2021 revision are the enhancement of the function of the board of directors, ensuring diversity in the core human resources of the company, and addressing issues related to sustainability. All of the revised general principles, principles, and supplementary principles apply to companies listed on the Prime Market and Standard Market, and only the general principles apply to companies listed on the Growth Market. However, considering that the Prime Market is a segment focused on constructive dialogue with global investors, the revised principles and supplementary principles also include a requirement for a higher level of governance for companies listed thereon.

7. The Stock Trading System (1)

Most of the transactions on the stock exchanges are effected during the trading sessions. In the case of the Tokyo Stock Exchange, the trading hours are divided into two sessions: the morning session, from 9:00 a.m. to 11:30 a.m., and the afternoon session, from 12:30 p.m. to 3:00 p.m.

There are mainly two types of orders: a limit order, by which a customer limits the acceptable price, and a market order, which is executed immediately at the price available in the market without restrictions or limits. Limit orders can be made in such increments as ¥1 or ¥10, with the allowable price increments being determined according to the price range of the stock. For some issues with particularly high liquidity (eligible issues will be expanded from TOPIX 100 component issues to TOPIX 500 component issues in June 2023), more minute price units have been established to improve contract prices and ease the wait for orders to be executed. The allowable price for a limit order is restricted to a fixed price range based on the closing price of the previous trading day, which also controls any sharp movement in stock prices.

Trading of shares on the exchange floor is conducted in accordance with the price-priority rule (under which a buy/sell order with the highest/lowest bid/offer price takes precedence over the others) and the time-priority rule (when there are orders at the same price, the order placed first takes precedence) and by either the *Tayos* method (single-price auction using an order book) or the *Araba* method (continuous auction).

***Itayos* method:** The *Itayose* method is a system that is used to determine the opening or first price when trading commences or resumes on the floor. All buy and sell orders for a given issue are matched according to the price-priority rule to find a single price that clears all market orders and meets cer-

Table X-9. Methods of Concluding Transactions

<i>Itayose</i> method			<i>Zaraba</i> method		
A memo (on a board) about an order received at the time an opening price is decided			A memo (on a board) about a <i>Zaraba</i> order for a given issue received		
(Asked price)	(Price)	(Bid price)	(Asked price)	(Price)	(Bid price)
H(2) I(4)	Market Quotation	K(1) M(3)		Market Quotation	
○○○	¥503		○○○	¥503	
○○○	¥502	T(1)	○○○	¥502	
○○	¥501	P(5) N(2)	○D(2) C(4)	¥501	
G(1) F(1) E(1)	¥500	A(4) B(3) C(2) D(1)	B(3) A(3)	¥500	
S(2)	¥499	○○○		¥499	F(3) G(2)○
R(4)	¥498	○○○		¥498	○○○
	¥497			¥497	○○○

- Notes: 1. Alphabetical letters represent securities companies.
 2. Figures given in parentheses represent the number of trading units, each consisting of 100 shares.
 3. ○○○ are blanks to be filled with securities companies bidding or asking prices and the number of trading units.
 4. In the case of the *Itayose* method, all bid and asked prices are considered to have been proposed simultaneously (simultaneous outcry).

The *Itayose* Method

- First, a sell order for 600 shares at a market-asked price without limit (200 shares by securities company H and 400 shares by securities company I) is matched against buy orders for 400 shares at a market-bid price without limit (100 shares by securities company K and 300 shares by securities company M). At this point, 200 shares at a market-asked price without limit are left unmatched.
- Then, assuming that the opening price will be ¥500, the remaining unfilled sell orders for 200 shares at a market-asked price without limit and those for 600 shares at an asked price of ¥499 or less (200 shares by securities company S and 400 shares by securities company R) are matched against buy orders for 800 shares at a bid price of ¥501 or more (500 shares by securities company P and 200 shares by securities company N and 100 shares by securities company T). As a result, sell orders for 1,200 shares at an asked price and buy orders for 1,200 shares at the bid price are matched.
- Lastly, a sell order for 300 shares at an asked price of ¥500 (100 shares by securities company E, 100 shares by securities company F, and 100 shares by securities company G) are matched against buy orders for 1,000 shares at a bid price of ¥500 (400 shares by securities company A, 300 shares by securities company B, 200 shares by securities company C, and 100 shares by securities company D). However, there are only 300 shares offered for sale at an asked price of ¥500, while there are buy orders for 1,000 shares at a bid price of ¥500. In such cases, all the sell orders for 300 shares at an asked price of ¥500 are matched against the buy orders for 100 shares each from securities company A, B, and C (for a total of 300 shares) at an asked price of ¥500. As a result, the opening price is decided at ¥500, and orders for a total of 1,500 shares are consummated at such price.

The *Zaraba* Method

- When the contents of an *Ita* (board) are as shown in the chart, a buy order of securities company M for 200 shares at a bid price of ¥500 can be consummated by matching the sell order of securities company A for 200 shares out of its original sell order for 300 shares.
- When securities company N places a buy order for 1,000 shares at a bid price without limit, it can be consummated by matching it against the remaining 100 shares offered for sale by securities company A at an asked price of ¥500 and a sell order of securities company B for 300 shares at an asked price of ¥500 and then a sell order of securities company C for 400 shares at an asked price of ¥501 and a sell order of securities company D for 200 shares at an asked price of ¥501.
- If securities company K places a sell order for 500 shares at an asked price of ¥499, a contract can be concluded by matching it against a buy order of securities company F for 300 shares at a bid price of ¥499 and a buy order of securities company G for 200 shares at a bid price of ¥499.
- As a result, the following trading agreements can be concluded

Selling securities company	Buying securities company	Contracted price	No. of shares
Securities company A	Securities company M	¥500	200 shares
Securities company A	Securities company N	¥500	100 "
Securities company B	Securities company N	¥500	300 "
Securities company C	Securities company N	¥501	400 "
Securities company D	Securities company N	¥501	200 "
Securities company K	Securities company F	¥499	300 "
Securities company K	Securities company G	¥499	200 "

- In such a manner, asked and bid prices are offered without interruption during the session hours, and when buy orders (sell orders) are matched against sell orders (buy orders), trading agreements are concluded.

tain other conditions.

Zaraba method: The *Zaraba* method is a system by which, following the establishment of the opening price by the *Tayos* method, trades are executed in a continuous auction, in principle, through the end of a session. Through this method, a newly placed buy/sell order is matched against the existing sell/buy order that has the highest precedence based on price priority and then on time priority in order to determine the execution price.

Securities codes used as identifiers for orders placed with the stock exchange used to comprise four digits. However, in response to the increase in the number of issues, securities codes for issues newly allocated from January 2024 will also incorporate Roman alphabet letters.

8. The Stock Trading System (2)

While most of the transactions are effected during the trading sessions, stock exchanges introduced complementary off-auction trading systems in the second half of the 1990s to accommodate need of executing block trades or basket trades.

During the initial period that followed the introduction of these systems, the systems were used solely for executing cross transactions (buy and sell orders by the same trading participant) due in part to the restriction that required orders to be placed via fax. However, the Tokyo Stock Exchange automated its off-auction trading system to improve efficiency and convenience with the introduction of *Toten* in June 1998 and expanded its trading system by adding new classes of transactions.

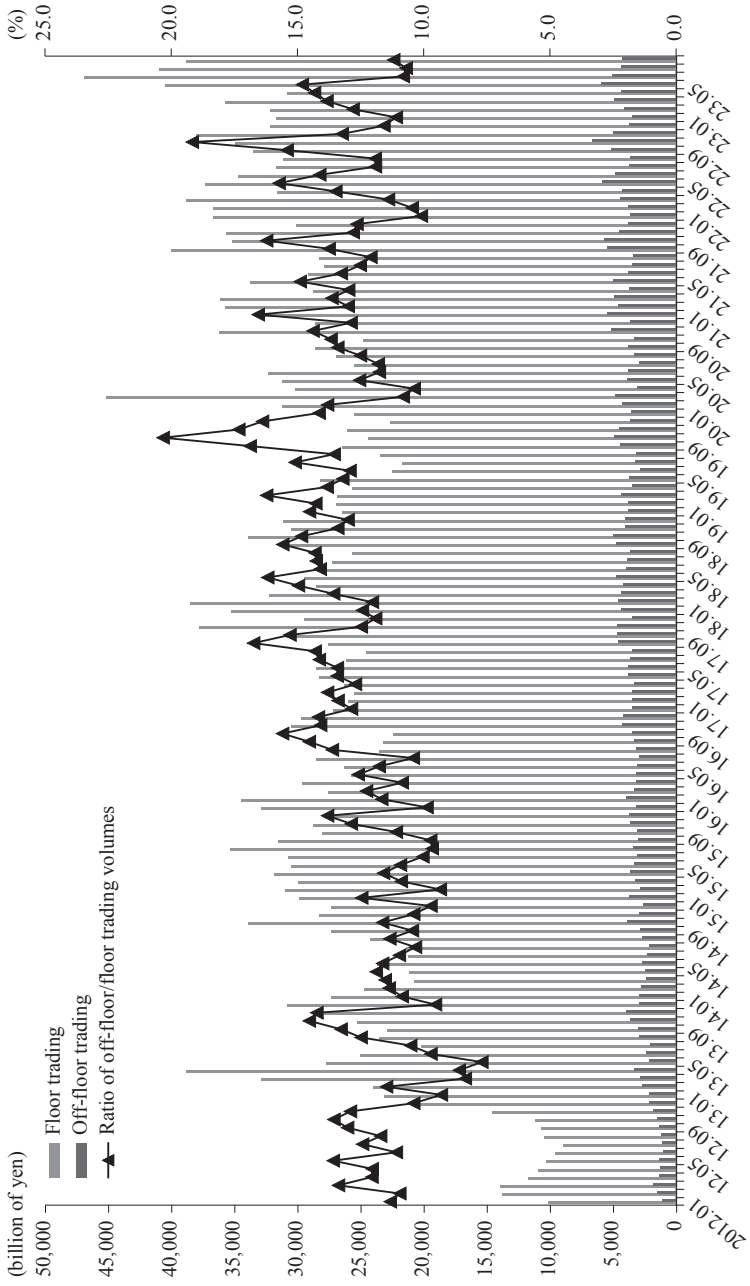
After that, in January 2008, further classes of transactions were added and trading hours were extended, making the market independent from trading sessions. Regarding single stock trading and basket trading, in August 2020 and May 2021, various measures were put in place to improve the system in line with the diversification of the transaction needs of investors, for instance through the expansion of the range of settlement dates that can be specified.

Toten, the off-auction trading system of the Tokyo Stock Exchange, accommodates the following four types of transactions: single-stock trading, basket trading, closing-price trading, and off-auction corporate share repurchases.

Single-Stock Trading: Under the single-stock trading system, investors can effect transactions in an individual stock issue at a price within plus-minus 7% (¥5 when 7% of the price is less than ¥5) of the last price of the issue on the floor or some other reference price as specified.

Basket Trading: The basket-trading system enables investors to trade baskets of a minimum of 15 stocks worth at least ¥100 million in aggregate val-

Chart X-7. A Comparison of the Trading Value of Floor Trading and Off-Floor Trading of the Tokyo Stock Exchange



ue within plus-minus 5% of the value of the basket based on the last prices of the component issues on the floor or some other reference prices as specified.

Closing-Price Trading: Under the closing-price trading system, off-auction orders of investors are matched, in principle, based on time priority before the morning and afternoon sessions and after the afternoon sessions at the closing prices of the preceding session or some other reference prices as specified.

Off-Auction Corporate Share Repurchases: Orders for share buyback are executed before the morning session at the previous day's closing prices or some other reference price as specified. Buyers eligible for the facility are limited to listed companies that intend to repurchase their own shares.

9. The Clearing and Settlement System (1)

Securities trading executed on the exchanges is cleared and settled through the Japan Securities Clearing Corporation (JSCC). Since January 2003, when JSCC was established all the clearing and settlement for securities trading carried out at each exchange have been unified under the JSCC.

The main functions performed by the JSCC are (1) to assume obligations, (2) to net shares and funds to transfer, (3) to instruct book-entry transfer, and (4) guarantee settlement.

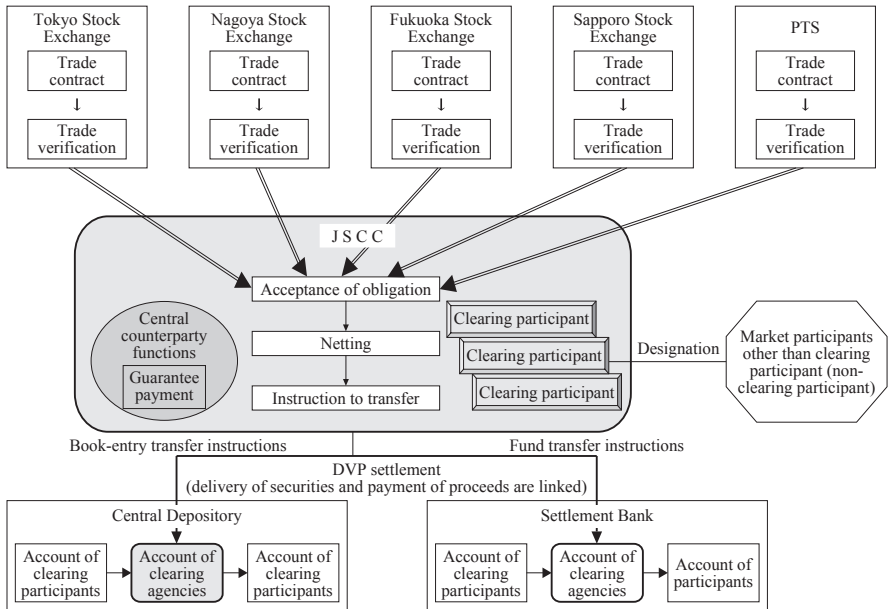
(1) Assuming obligations: Upon the execution of a transaction on a stock exchange, the JSCC assumes the obligations of both the buyer and the seller against the other party (for the seller to deliver the securities sold and for the buyer to make payment for them) and, at the same time, acquires claims corresponding to both obligations. Thus, the JSCC takes up the role as the counterparty for claims and obligations. It helps enhance the efficiency of settlement operations on the part of clearing participants (those who are qualified for handling clearing and settling securities transactions through the JSCC) because the JSCC is the single settlement counterparty.

(2) Netting: The JSCC mutually offsets (nets) volumes bought and sold, and proceeds and payments, and settles the net balance. This streamlines fund payments and securities transfers required in the settlement procedures.

(3) Book-entry transfer instructions: The JSCC, after determining the settlement amount through netting, instructs the Japan Securities Depository Center, the settlement organization, to make transfers of securities, and the Bank of Japan or the fund settlement bank designated by JSCC to make the transfer of funds.

(4) Making settlement guarantees: Even in the case of a clearing participant failing to settle a trade, the JSCC performs and guarantees the settlement as the settlement counterparty against any other clearing participant. Thanks

Chart X-8. Delivery and Settlement Using JSCC (Exchange Transactions)



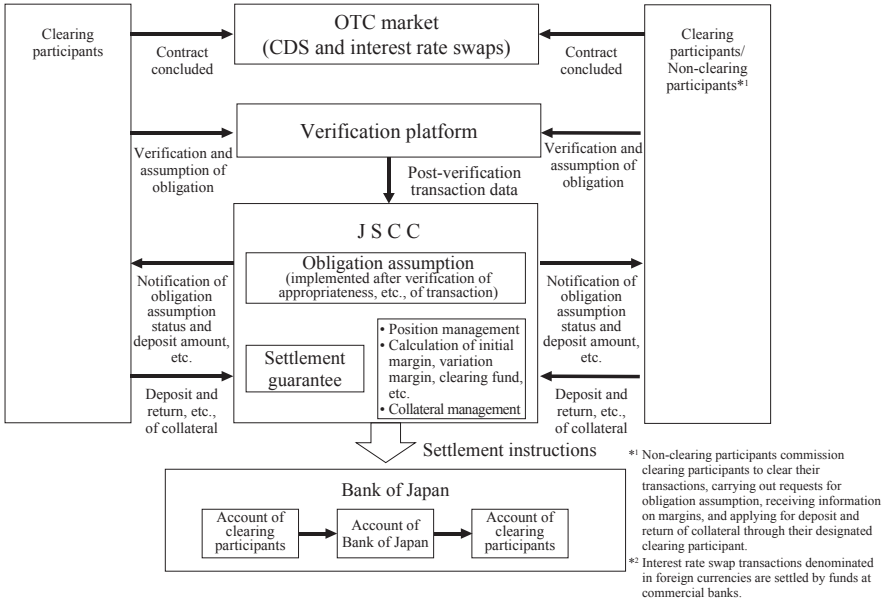
- * The Clearing Agency is referred to as the Central Counter Party (CCP). It stands between the buyer and seller and acts as the settlement counterparty for both parties.
- * Transactions by non-clearing participants (market participants other than clearing participants) are settled by clearing participants designated in advance by the non-clearing participants.

to this settlement guarantee, parties can trade securities without being concerned about the settlement default risk on the part of the original trade counterparties.

Since its inception, the JSCC has expanded the scope of its clearing and settlement services, adding on offering services for securities traded on proprietary trading systems (PTSs) in 2010. After the global financial crisis, moreover, the regulatory reform of OTC derivatives trading has advanced around the world, with each country obliged to clear and settle standardized OTC derivatives trading through a central clearing house (central counterparty clearing).

The JSCC commenced clearing and settlement services for credit default swaps (CDS) transactions in July 2011 and for interest rate swaps in October 2012. In October 2013, the JSCC merged with the Japan Government Bond Clearing Corporation and thereby added OTC JGB transaction clearing and settlement services. Then, alongside the transformation of Japan Exchange Group into a comprehensive exchange, the merger of JSCC and the Japan

Chart X-9. Delivery and Settlement Using JSCC (OTC Derivatives Transactions)



Commodity Clearing House in July 2020 enabled the start of clearing services for commodity derivatives transactions, including precious metals.

10. The Clearing and Settlement System (2)

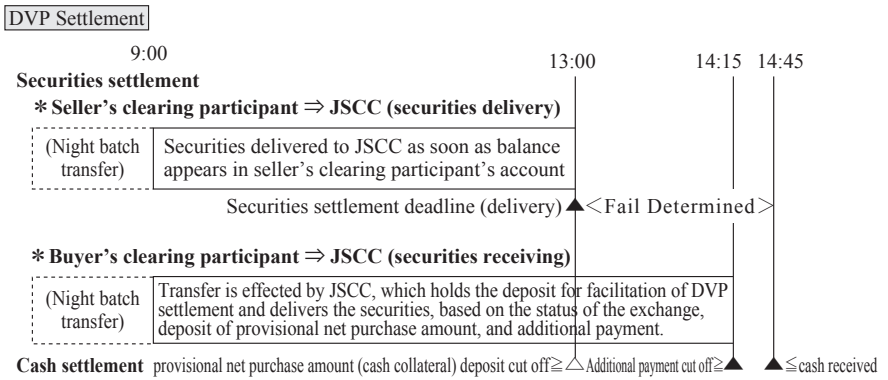
With a view to eliminating the risk involved in the settlement of transactions in shares (and other securities handled by the Japan Securities Depository Center), in general, and the risk of a default in the payment of the principal, in particular, after the delivery of underlying securities, the JSCC has introduced a delivery-versus-payment system (DVP settlement system).

DVP settlement links the exchange of securities and funds, whereby securities are delivered on the condition that payment is made and vice versa. This ensures that the transaction does not fail even if payment default occurs.

DVP settlement by JSCC takes place on the third business day counting from the trade date (T+2) for transactions of shares and convertible bonds with new share reservation rights (CB) issues handled by the Japan Securities Depository Center on exchanges and PTS where obligation is assumed.

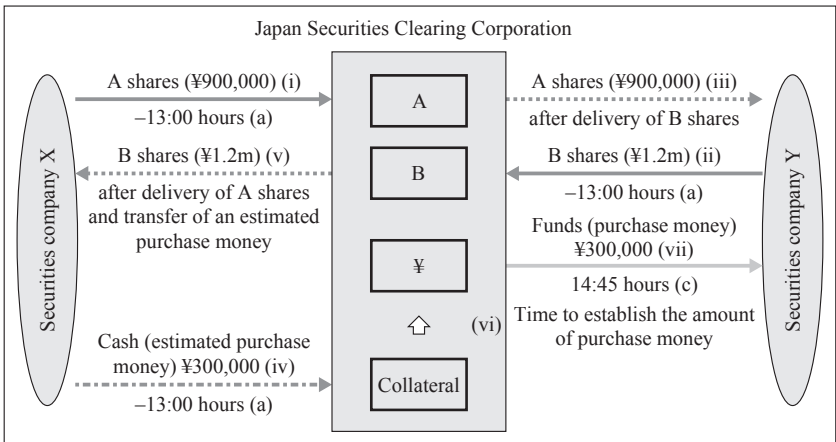
Under the DVP settlement system, a buyer basically cannot take delivery

Chart X-10. DVP Settlement Timetable



Note: The receiving of securities by the buyer's clearing participant is carried out in a way that eliminates the risk of principal default versus the cash payer JSCC through nonperformance of obligations or of delivery of collateral.

Chart X-11. The DVP Scheme (normal settlement)



Deadline for settlement:

- Deadline for the delivery of securities and the deposit of the estimated purchase money (cash collateral): 13:00
 - Deadline for the payment of purchase money: 14:15
 - Time for the receipt of purchase money: 14:45
- Securities company X delivers A shares while (ii) securities company Y delivers B shares to JSCC by 13:00.
 - Securities company Y can receive A shares after delivering B shares to JSCC.
 - Securities company X deposits the estimated purchase money to JSCC by 13:00.
 - Securities company X can receive B shares after (i) and (iv) have been executed.
 - JSCC appropriates the estimated purchase money for the payment relating to funds settlement at the time the amount of the purchase money is finalized.
 - Securities company Y receives the funds (purchase money) at 14:45.

of shares until such time as payment from them (via fund transfer) has been verified. This, however, could undermine the overall efficiency of settlement, including payment and delivery between clearing participants and customers.

Therefore, JSCC has established a mechanism for early receipt of securities. It allows the buy-side clearing participant to receive securities prior to the completion of funds settlement on deposit of cash or securities equivalent to the value of the securities to be received as collateral.

Also, in the event that a sell-side clearing participant should fail to deliver a security by the settlement deadline on the settlement date (known as a “fail”), the JSCC will carry over the delivery of and payment for the securities to the following day, with delivery and payment settlement netted off against delivery and payment of securities scheduled for that day.

However, since settlement is in principle due on the settlement date, there are mechanisms in place to prevent repeated fails, such as late payment penalties against clearing participants if a fail occurs or a buy-in (right of a participant who has suffered a fail to request compulsory purchase and delivery of the securities concerned).

11. The Book-Entry Transfer System for Stocks, Etc.

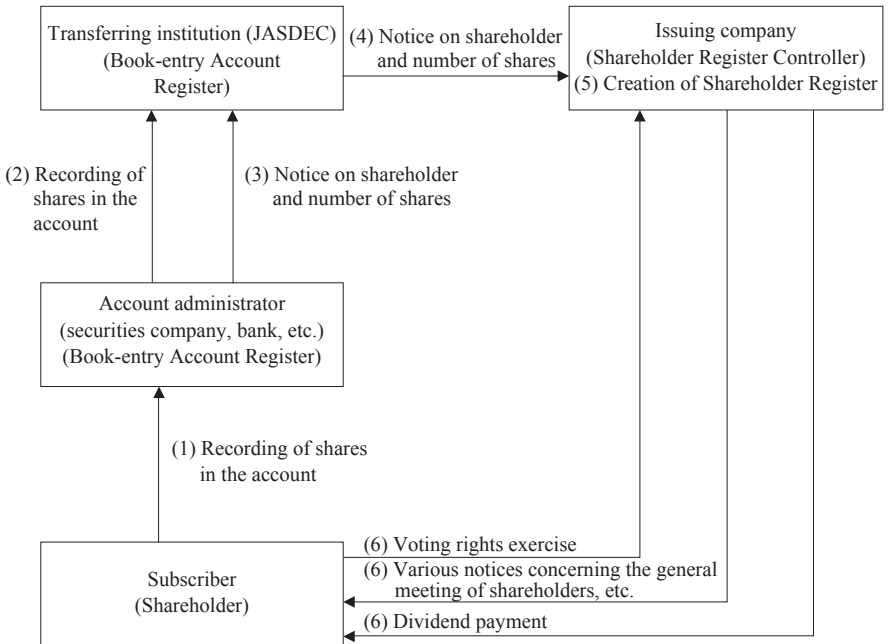
Administration of shareholder ownership rights, etc. of listed companies is performed by the book entry transfer system of the Japan Securities Depository Center, Inc. (JASDEC), the central depository for shareholder ownership rights, and transfer accounts set up by securities firms, etc. which are account administrators. Previously, administration was carried out on the premise of the existence of share certificates, etc.; now this is done electronically since share certificates were dematerialized in January 2009 through the digitization of the share certificates.

Securities eligible for the book-entry transfer system for stocks, etc., include stocks listed on domestic public exchanges; convertible-type corporate bonds (CB); investment units, such as real estate investment trusts (REIT); and preferred shares of cooperative financial institutions, subscription rights/warrants, beneficiary certificates of exchange-traded funds (ETFs), Japanese depository receipts (JDR), and others.

The features and functions of the book-entry transfer system for stocks, etc., are as follows.

(1) Shareholders' ownership rights are administrated based on the records of the transfer account book, with transfers of shares being processed through the transfer account. (2) Account administrators inform JASDEC of the identification of beneficiary shareholders, including their names and addresses along with their share ownership data. JASDEC then compiles the informa-

Chart X-12. Relationships Among Participants, JASDEC and Issuers in the Book-Entry Transfer System for Stocks, etc.



tion to periodically report to respective issuers (general shareholder notification). (3) Issuing companies produce their records of voting rights for general meetings of shareholders and retained earnings distributions based on a register of beneficiary shareholders drawn up from the general shareholder notification. (4) Minority shareholders, etc., can exercise their rights by applying to JASDEC to have a notification sent to the issuer verifying their shareholdings, duration of ownership, and other particulars (individual shareholder notification). They can then exercise their rights for a limited period of time following receipt of the notification.

The main benefits that are expected from transition to the electronic book-entry transfer system include:

(1) shareholders can eliminate the risks of loss, theft, or forgery of certificates that are held at their own risk, and they also do not need to submit certificates to the issuer for replacement in the event of a corporate name change or change in the share trading unit; (2) issuers can save costs associated with issuance, such as printing costs and stamp duties, as well as those associated with corporate reorganization (such events as corporate mergers, exchanges

Table X-10. Major Changes in the System Before & After Implementation of Electronic Share Certificate System

	Central Depository and Book-Entry Transfer System (before dematerialized)	Book-Entry Transfer System (current)
Share certificates	<ul style="list-style-type: none"> • Share certificates • Share certificates deposited with JASDEC are centrally stored at JASDEC and issued upon request • Share certificates outside the Book-Entry System are kept individually by owners 	<ul style="list-style-type: none"> • No share certificates
Attribution of rights	<ul style="list-style-type: none"> • Presumption of rights on stock by ownership of share certificates (outside the Book-Entry System) • Party recorded in the account register is regarded as the owner of share certificates 	<ul style="list-style-type: none"> • Presumption of rights regarding stocks recorded in the book-entry account register
Form of shareholder management	<ul style="list-style-type: none"> • Managed by shareholder register (outside the Book-Entry System) • Managed by substantial shareholder register (within the Book-Entry System) • Name-based aggregation of shareholders is performed by the shareholder register controller 	<ul style="list-style-type: none"> • Uniformly managed by shareholder register • JASDEC performs name-based aggregation and notifies the shareholder register controller
Transfer of stocks	<ul style="list-style-type: none"> • Issuance of share certificates (outside the Book-Entry System) • Account transfer (within the Book-Entry System) 	<ul style="list-style-type: none"> • Account transfer

of shares, and stock transfers) for collecting old certificates and distributing new ones; and (3) securities companies can reduce the risks and costs associated with the storage and transport of certificates.

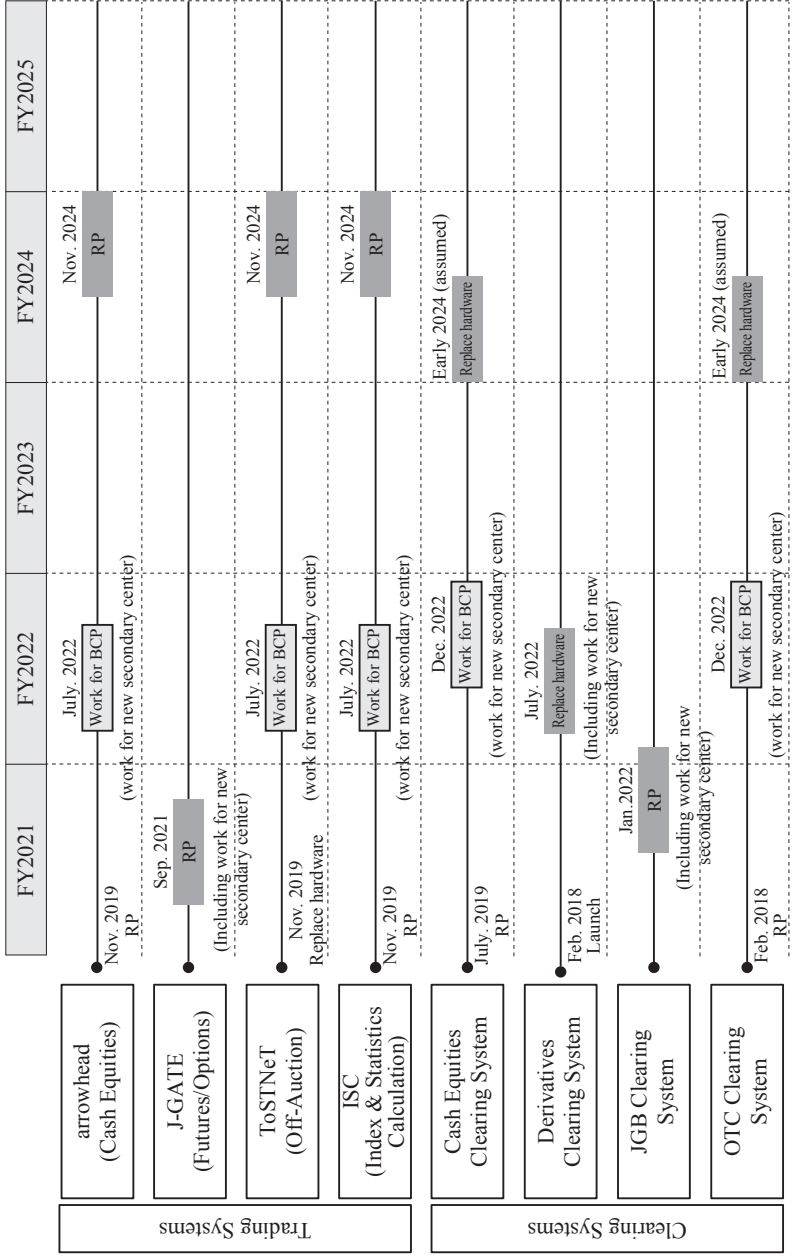
12. Computerized Trading and Clearing Systems of the Financial Instruments Exchange (Stock Exchange) (1)

The following is a summary of the electronic stock trading system and the settlement and clearing system that maintain the stock market.

In the cash market of the Tokyo Stock Exchange (TSE), the stock trading system processes stocks, corporate bonds with subscription rights/warrants, etc. (convertible bonds), and other transactions during the trading sessions and the off-auction ToSTNeT market. Orders from a trading participant are mainly entered through the trading participant's in-house system or through a direct connection to the TSE's trading system.

The computerization of securities trading at the TSE started with CORES

Chart X-13. System Integration Schedule of Japan Exchange Group, Inc.



Source: IT Master Plan, Japan Exchange Group, March 2023.

(Computer assisted Order Routing and Execution System) (the old stock trading system) that was introduced to the Second Section in January 1982. The current stock trading platform consists of arrowhead and the ToSTNeT system.

With the basic policy of enhancing three features — reliability, convenience and processing capacity — arrowhead has been renewed three times in order to accommodate the further development of electronic trading, a continuing increase in the number of orders, and other changes in the market environment as well as to respond better to risks that the development of electronic trading can create on the market.

In addition, a fourth system renewal is scheduled for November 2024 in order to further improve convenience for market users, international competitiveness, and resilience.

The Japan Exchange Group, Inc. (JPX) commenced operations in January 2013. In July 2013, it amalgamated the cash equity markets of the TSE and OSE while also integrating the stock and CB trading system of the OSE into the TSE's arrowhead and ToSTNeT systems.

The settlement and clearing system for stocks and CBs is designed to support delivery and other operations for the settlement and clearing of transactions executed on the TSE and other markets. Since January 2003, the JSCC has acted as the cross-market clearing organization for all domestic exchanges. The system was upgraded in July 2019 in line with the shortening of the settlement period for stocks and other securities.

The data for this process from trading participants, etc., is passed through the TSE's dedicated network arrownet.

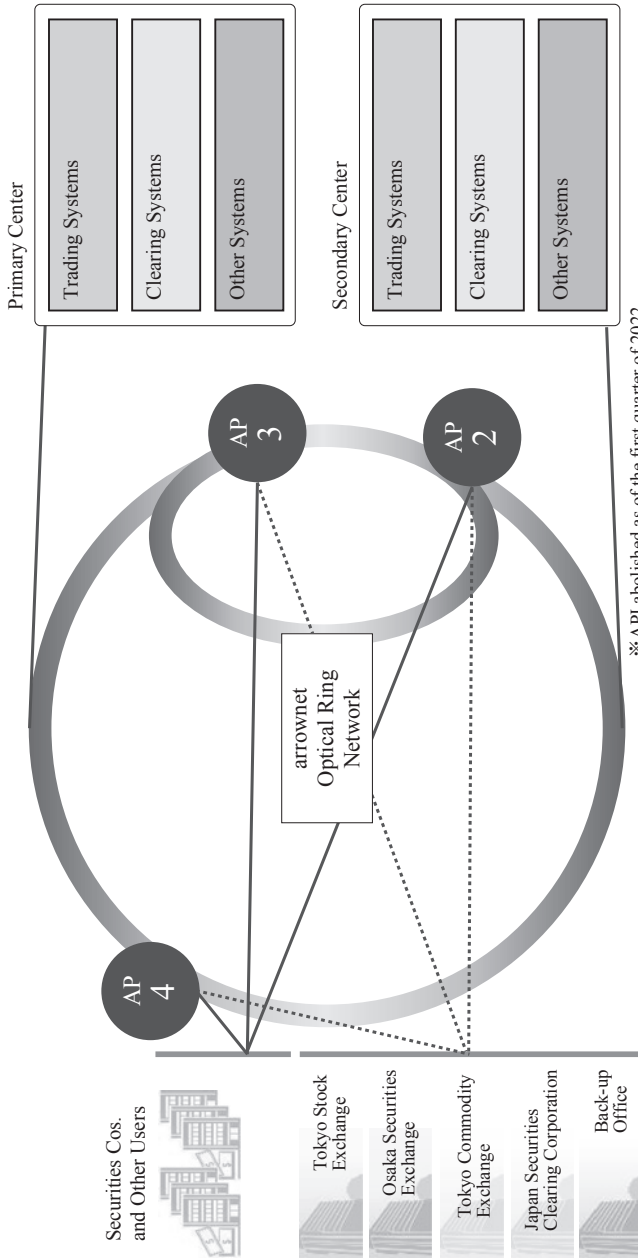
13. Computerized Trading and Clearing Systems of the Financial Instruments Exchange (Stock Exchange) (2)

The following is a summary of the trading system and the settlement and clearing system that support the derivatives market.

The derivatives trading system is a system for entering and matching orders, preparing transaction reports, and inquiring into the state of the order book, etc., of the derivatives market of the OSE. The system processes futures, options, and other transactions during the trading sessions and the off-auction market. Orders from a trading participant are mainly entered through the trading partner's in-house system or through a direct connection to the TSE's trading system.

The OSE's trading system for derivatives, J-GATE, has the same functions and transaction formats as the systems used by major overseas markets. In introducing the system which began operation in February 2011, the OSE re-

Chart X-14. Image Diagram of Japan Exchange Group's System (as of April 2023)



Source: IT Master Plan, Japan Exchange Group, March 2023.

viewed the complex transaction system peculiar to Japan to address the shift among investors to algorithmic and other advanced and diversified trading methods.

Following the launch of JPX in January 2013, the derivatives markets of the TSE and the OSE were amalgamated on the OSE market in March 2014, and derivatives products listed on the TSE were integrated into J-GATE. The J-GATE network was also consolidated into arrownet in September 2014.

In July 2016, the system was updated with NASDAQ's Genium INET Trading as the base with a view to further increasing stability and reliability as well as promoting liquidity. In September 2021, the system was updated to enable the addition of flexible products and functions, and to further improve system reliability and convenience.

Although the OSE had been using the OSE clearing system while the TSE used the JSCC clearing system, the clearing organizations were integrated into the JSCC in July 2013 and all margin operations relating to derivatives trading have since been processed on the JSCC clearing system. Subsequently, in November 2014, clearing and settlement operations were also integrated into the JSCC clearing system. In February 2018, partial replacements were made for the settlement and clearance function for futures options transactions.

In July 2020, following the merger of the Tokyo Commodity Exchange (TOCOM) and its clearing organization, the Japan Commodity Clearing House (JCCH), clearing and settlement operations for commodity derivatives were integrated into the JSCC clearing system.