



CHARTERED INSTITUTE FOR
SECURITIES & INVESTMENT

Securities Level 3

Effective from 22 March 2023

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Objective of the Examination

The objective of the examination is to ensure that candidates have a basic understanding of global market infrastructure, operation and practice.

The examination will test candidates' knowledge and understanding of the following elements:

- The Financial Services Industry
- Asset Classes
- Markets
- Primary Markets
- Secondary Markets
- Corporate Actions
- Clearing and Settlement
- Accounting analysis
- Investment Management

Syllabus Structure

The unit is divided into **elements**. These are broken down into a series of **learning objectives**.

Each learning objective begins with one of the following prefixes: **know, understand or be able to calculate**. These words indicate the different levels of skill to be tested.

- **know** requires the candidate to recall information such as facts, rules and principles
- **understand** requires the candidate to demonstrate comprehension of an issue, fact, rule or principle

- **be able to calculate** requires the candidate to be able to use formulae to perform calculations

Candidate Update

Candidates are reminded to check the 'Candidate Update' area of the Institute's website (cisi.org/candidateupdate) on a regular basis for updates that could affect their examination as a result of industry change.

Examination Specification

Each examination paper is constructed from a specification that determines the weightings that will be given to each element. The specification is given below.

It is important to note that the numbers quoted may vary slightly as there is some flexibility to ensure that each examination has a consistent level of difficulty.

However, the number of questions tested in each element should not change by more than two.

Examination specification		
100 multiple choice questions		
Element number	Element	Questions
1	Introduction	3
2	Asset Classes	27
3	Error! Reference source not found.	1
4	Primary Markets	14
5	Error! Reference source not found.	15
6	Corporate Actions	7
7	Clearing and Settlement	8
8	Accounting Analysis	14
9	Investment Management	11
Total		100

Assessment Structure

Assessment is a 2 hour examination of 100 multiple choice questions.

Candidates sitting the exam by Computer Based Testing may have, in addition, up to 10% additional questions as trial questions that will not be separately identified and do not contribute to the result. Candidates will be given proportionately more time to complete the test.

Summary Syllabus

Element 1 Introduction

- 1.1 The Financial Services Industry

Element 2 Asset Classes

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- 2.2 Shares
- 2.3 Debt instruments
- 2.4 Government Debt
- 2.5 Corporate Debt
- 2.6 Eurobonds
- 2.7 Other securities
- 2.8 Foreign Exchange
- 2.9 Collective Investments
- 2.10 Structured Products

Element 3 Markets

- 3.1 Principal Characteristics

Element 4 Primary Markets

- 4.1 Types of Offer
- 4.2 Participants involved with equity offerings
- 4.3 Stock Exchanges
- 4.4 Bond Offerings

Element 5 Secondary Markets

- 5.1 Trading venues
- 5.2 Methods of Training and Participants
- 5.3 Stock Exchanges
- 5.4 Indices
- 5.5 Government Bonds
- 5.6 Corporate Bond Markets
- 5.7 Dealing Methods

Element 6 Corporate Actions

- 6.1 Income Events
- 6.2 Capital Events
- 6.3 Capital Raising Events

6.4 Share capital and changes to share ownership

Element 7 Clearing and Settlement

7.1 Activities

7.2 Stock Borrowing and Lending

Element 8 Accounting Analysis

8.1 Basic principles

8.2 Statement of Financial Position

8.3 Statement of Comprehensive Income

8.4 Statement of Cash Flows

8.5 Additional information

8.6 Financial Statements Analysis

Element 9 Investment Management

9.1 Risk and Reward

9.2 Eligible Complainant

9.3 Procedures

Element 1 Introduction

1.1 The Financial Services Industry

On completion, the candidate should:

1.1.1 know the differences between retail and professional businesses, including:

- their clients
- equity markets
- bond markets
- foreign exchange markets

1.1.2 know the role of the following within the retail sector of the financial services markets:

- banks
- pension funds
- insurance companies
- investment services
- financial planning and advice

1.1.3 know the role of the following within the wholesale sector of the financial services markets:

- investment banks
- fund managers
- stockbrokers
- custodians

1.1.4 know the basic differences between equities and bonds

Element 2 Asset Classes

2.1 Cash Assets

On completion, the candidate should:

2.1.1 understand the uses, advantages and disadvantages of holding cash deposits

2.1.2 understand the features and characteristics of Treasury Bills:

- issuer
- purpose of issue
- minimum denomination
- normal life
- no coupon and redemption at par

2.1.3 know the principal features and uses of Commercial Paper:

- issuers, including CP Programmes
- investors
- discount security
- unsecured
- asset backed
- rating
- normal life
- method of issuance
- role of dealer

2.1.4 understand the basic purpose and characteristics of the repo markets:

- repo
- reverse repo
- documentation
- benefits of the repo market

2.2 Shares

On completion, the candidate should:

2.2.1 Understand the advantages and disadvantages to issuers and investors of the following investments and their principal features and characteristics:

- ordinary shares
- non-voting shares
- redeemable shares
- partly paid shares and calls
- and in respect of these the generally accepted practice regarding ranking for dividends and voting rights

2.2.2 understand the advantages and disadvantages to issuers and investors of the following classes of preference/preferred shares and their principal characteristics

- cumulative
- participating
- redeemable
- convertible
- zero coupon preference shares

2.3 Debt instruments

On completion, the candidate should:

2.3.1 know the principal features and characteristics of debt instruments (fixed interest, floating rate and index linked)

2.3.2 understand the uses and limitations of the following:

- flat yield
- gross redemption yield (using internal rate of return)
- net redemption yield
- modified duration in the calculation of price change

2.3.3 be able to calculate

- simple interest income on corporate debt
- conversion premiums on convertible bonds and whether it is worth converting
- flat yield
- accrued interest (given details of the day count conventions)

2.3.4 understand the concept of spreads:

- spread over a government bond benchmark
- spread over/under swap

2.3.5 understand the role of the yield curve and the relationship between price and yield with reference to the yield curve (normal and inverted)

2.3.6 be able to calculate the present value of a bond (maximum 2 years) with annual coupon and interest income

2.3.7 understand the implications of negative interest rates for the bond market

2.4 Government Debt

On completion, the candidate should:

2.4.1 understand the following features and characteristics of conventional government debt:

- redemption price
- interest payable
- accrued interest
- effect of changes in interest rates
- concept of risk free

2.4.2 understand the following features and characteristics of index linked debt:

- index-linking inflation – effects and measurement
- effect of the index on price, interest and redemption

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- return during a period of zero inflation or deflation

2.4.3 understand the purpose and characteristics of the strip market:

- advantages, disadvantages and uses
- result of stripping and reconstituting a bond
- zero coupon securities

2.4.4 understand the characteristics and differences between government bonds in developed and emerging markets:

- settlement periods
- coupon payment frequency
- terms and maturities
- currency, credit and inflation risks

2.5 Corporate Debt

On completion, the candidate should:

2.5.1 understand the principal features and uses of secured debt:

- fixed charges and floating charges
- asset backed securities
- mortgage backed securities
- covered bonds
- securitisation process
- role of the trustee, when involved
- different tiers of bank debt

2.5.2 understand the principal features and uses of unsecured debt:

- subordinated
- guaranteed
- convertible bonds

2.5.3 understand the principal features and uses of credit ratings:

- rating agencies
- impact on price
- uses and risks of credit enhancements
- difference between investment grade and sub-investment grade bonds
- limitations

2.6 Eurobonds

On completion, the candidate should:

2.6.1 understand the principal features and uses of Eurobonds:

- issuing process
- bearer
- immobilised in depositories
- accrued interest
- ex-interest date
- interest payments

2.7 Other securities

On completion, the candidate should:

2.7.1 know the principal features and characteristics of Depositary Receipts:

- American Depositary Receipts
- Global Depositary Receipts
- means of creation including pre-release facility
- registration
- rights attached
- dividends

- exchange for underlying shares

2.7.2 know the rights, uses and differences between warrants and covered warrants:

2.7.3 know the risks and rewards involved in investment in property and the differences between the different investment routes:

- direct investment
- Real Estate Investment Trusts
- Open ended collective funds

2.8 Foreign Exchange

On completion, the candidate should:

2.8.1 know the principal features and uses of spot, forward and cross rates:

- quotation as bid-offer spreads
- forwards quoted as bid-offer margins against the spot
- quotation of cross rates

2.8.2 be able to calculate spot and forward settlement prices using:

- adding or subtracting forward adjustments
- interest rate parity

2.8.3 understand the factors that affect foreign exchange rates:

- freely floating exchange rates
- purchasing power parity
- currency demand and supply

2.8.4 understand the factors that affect foreign exchange trading and speculation

2.8.5 know the characteristics of crypto currencies

2.9 Collective Investments

On completion, the candidate should:

- 2.9.1 understand the differences between regulated and unregulated collective investment schemes and their advantages and disadvantages to the issuer and investor
- 2.9.2 understand the differences between open ended and closed ended collective investment schemes and their advantages and disadvantages to the issuer and investor
- 2.9.3 understand the circumstances under which a collective investment scheme may be exchange traded or offered by a fund manager
- 2.9.4 understand the circumstances where a collective investment scheme would be issued under a Deed of Trust and where it may be company or private equity based

2.10 Structured Products

On completion, the candidate should:

2.10.1 know the key features and components of Structured Products:

- definition
- uses and benefits
- components

2.10.2 know the pay-out structures of Structured Products:

- callable
- range accruals payoff
- averaging values
- lookback
- cash or nothing payoff
- quantity adjusting (Quantos)

2.10.3 know the risks associated with Structured Products:

- credit risk
- income risk
- pay-out structure risk
- market risk

- liquidity risk
- currency risk
- option risk
- call risk
- counterparty risk

Element 3 Markets

3.1 Principal Characteristics

On completion, the candidate should:

3.1.1 know the principal characteristics of, and the differences between, primary and secondary markets. In particular:

- uses of primary and secondary markets
- users of the primary and secondary market
- the role of the governing authority

Element 4 Primary Markets

4.1 Types of Offer

On completion, the candidate should:

4.1.1 understand the use of an initial public offering:

- why would a company choose an IPO
- structure of an IPO – base deal plus greenshoe
- stages of an IPO
- underwritten versus best efforts

4.1.2 understand the use of follow on offerings:

- why would a company choose a follow on offering
- structure of a follow on – base deal plus greenshoe

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- stages of a follow on offering
- underwritten versus best efforts

4.1.3 understand the use of offers for sale:

- why would a company choose an offer for sale
- structure of an offer for sale
- stages of an offer for sale
- tenders, strike price, who may receive an allotment, who is involved in the offer process

4.1.4 understand the basic process and uses of selective marketing and placing:

- advantages to the issuing company
- what is a placing
- what is selective marketing
- how is a placing achieved
- how is selective marketing achieved

4.1.5 understand the use of introductions:

- why would a company undertake an introduction
- structure of an introduction
- stages of an introduction

4.1.6 understand the use of exchangeable / convertible bond offerings:

- the difference between exchangeable and convertible bonds
- structure of an offering – base deal plus greenshoe
- stages of an offering
- underwritten versus best efforts

4.2 Participants involved with equity offerings

On completion, the candidate should:

4.2.1 understand the role of a Syndicate Group:

- different roles within a Syndicate:
 - bookrunner
 - co-lead manager
 - co-manager
 - marketing and bookbuilding

4.2.2 know the role of advisors:

- Listing Agent
- Corporate Broker
- Nominated advisor (Nomad)

4.2.3 know the issuer's obligations:

- corporate governance
- reporting

4.2.4 understand the purpose and practice of underwriting and the rights and responsibilities of the underwriter:

- benefits to the issuing company
- risks and rewards to the underwriter

4.2.5 understand stabilisation and its purpose:

- governing principles and regulation with regard to stabilisation activity
- who is involved in stabilisation
- what does stabilisation achieve
- benefits to the issuing company and investors

4.3 Stock Exchanges

On completion, the candidate should:

4.3.1 know the role of stock exchanges and their regulatory frameworks

4.3.2 understand the purpose of admission criteria for main markets and how they can differ from other markets listing smaller companies:

- appointment of advisors and brokers

- transferability of shares
- trading record
- amount raised
- percentage in public hands
- shareholder approval
- market capitalisation
- costs

4.4 Bond Offerings

On completion, the candidate should:

4.4.1 know the different types of issuer:

- supranationals
- governments
- agency
- municipal
- corporate
- financial institutions & special purpose vehicles

4.4.2 know the methods of issuance:

- scheduled funding programmes and opportunistic issuance e.g., Medium Term Notes (MTN)
- auction/tender
- reverse inquiry (under MTN)

4.4.3 understand the role of the Origination Team including:

- pitching
- indicative bid
- mandate announcement
- credit rating
- roadshow

- listing
- syndication

Element 5 Secondary Markets

5.1 Trading venues

On completion, the candidate should:

- 5.1.1 understand the main characteristics and practices in the developed markets
- 5.1.2 understand main characteristics and practices in the emerging and frontier markets
- 5.1.3 understand the purpose and main features of stock exchanges generally. In particular:
 - Scope
 - provision of liquidity
 - price formation
 - brokers versus dealers
- 5.1.4 understand the the purpose, role and main features of Alternative Trading venues:
 - Off-exchange trades
 - Dark Pools
 - OTC
 - Private transactions
 - Multilateral Trading Facilities

5.2 Methods of Training and Participants

On completion, the candidate should:

- 5.2.1 understand the differences between quote driven and order driven markets and how they operate
- 5.2.2 know the functions and obligations of:

- market makers
- broker dealers
- inter-dealer brokers
- systematic internalisers

5.2.3 understand Algorithmic Trading

- reasons
- consequences of High Frequency Trading
- types of company that pursue this strategy
- latency/co-location

5.2.4 understand the main services provided by an Equity and Fixed Income prime broker, including:

- securities lending and borrowing
- leverage trade execution
- cash management
- core settlement
- custody
- rehypothecation

5.3 Stock Exchanges

On completion, the candidate should:

5.3.1 understand the rules, procedures and requirements applying to dealing through Stock Exchanges' bespoke electronic systems and hybrid trading systems relating to:

- order book features
- order management
- limitations and benefits of trading through bespoke systems
- right to call a halt in trading
- liquidity

- market makers

5.3.2 understand the following order types and their differences:

- market
- limit
- fill or kill
- all or none
- execute and eliminate
- iceberg
- multiple fills

5.3.3 understand the operation, purpose, benefits and limitations of using a central counterparty

5.3.4 understand the concept of stamp duties and other transaction taxes and costs on securities trades and the potential for their variation between types of security

5.4 Indices

On completion, the candidate should:

5.4.1 know how different indices are created their purpose:

- types of index
- purpose of weighted indices
- purpose of unweighted indices
- sector versus national indices
- price return, total return & net total return indices
- the implications of free float on market capitalisation

5.5 Government Bonds

On completion, the candidate should:

5.5.1 know the functions, obligations and benefits of the following in relation to government bonds:

- primary dealers
- broker dealers
- inter-dealer brokers
- Government issuing authorities

5.6 Corporate Bond Markets

On completion, the candidate should:

5.6.1 understand the characteristics of corporate bond markets:

- decentralised dealer markets and dealer provision of liquidity
- the impact of default risk on prices
- the differences between bond and equity markets
- dealers rather than market makers
- bond pools of liquidity versus centralised equity exchange
- relevance of the retail bond market

5.7 Dealing Methods

On completion, the candidate should:

5.7.1 know the different trading methods for bonds:

- OTC inter-dealer voice trading
- inter-dealer electronic market
- OTC customer to dealer voice trading
- customer to dealer electronic market
- on Exchange trading

5.7.2 understand the different trends between trading methods:

- characteristics of electronic trading
 - OTC
 - exchange traded

- price driven via Inter-dealer brokers (IDB) – dealer to dealer
- request for quote (RFQ) –customer to dealer

5.7.3 know the factors that influence bond prices:

- Issuer factors
 - yield to maturity
 - seniority
 - structure
 - technical factors
 - credit rating
- market factors
- benchmark bonds
- liquidity premiums for highly-traded bond issues
- indicative pricing versus firm two-way quotes
- availability of a liquid repo market and the difficulty in offering illiquid bonds
- inability to borrow or cover shorts

Element 6 Corporate Actions

6.1 Income Events

On completion, the candidate should:

6.1.1 understand the main types of dividends and bond coupon payments:

- Characteristics
- Benefits to the investor
- Benefits to the issuing company

6.2 Capital Events

On completion, the candidate should:

6.2.1 know the main types of bond repayment events:

- Bullet maturities
- Callable and puttable bonds
- Sinking funds

6.2.2 understand the characteristics and rationale for capital restructuring events and the effect on the company's accounts:

- bonus issues
- stock splits
- reverse stock splits

6.2.3 be able to calculate the impact of bonus issues, stock splits and reverse stock splits on the share price

6.3 Capital Raising Events

6.3.1 understand the characteristics of rights issues

- reasons for a rights issue
- pre-emptive rights
- structure of rights issue
- stages of rights issue
- trading nil paid

6.3.2 be able to calculate

- the impact of a rights issue on the share price
- the maximum nil paid rights to be sold to take up the balance at nil cost
- the value of nil paid rights

6.4 Share capital and changes to share ownership

On completion, the candidate should:

6.4.1 understand why share buybacks are undertaken:

- governing regulation
 - resolution at AGM
 - limits on percentage of shares and price
 - use of company's own money
- key aspects of share buybacks – criteria to comply with
- different structures regarding block trades
- accelerated bookbuild – best efforts basis
- accelerated bookbuild – back stop price
- bought deal

6.4.2 understand how and why stake building is used:

- strategic versus acquisition
- direct versus indirect
 - direct – outright purchase, i.e. dawn raid
 - indirect – CFDs
- disclosure thresholds, including mandatory takeover threshold

6.4.3 know the characteristics of takeovers and mergers

Element 7 Clearing and Settlement

7.1 Activities

On completion, the candidate should:

7.1.1 understand main stages of clearing and settlement

7.1.2 understand the concept of DVP and the main differences between DVP models 1 to 3 as defined by the BIS

7.1.3 know the concept of custody and the roles of the different types of custodian

- Global
- Regional

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- Local
- Sub custodian

7.1.4 understand the implications of registered title

- registered title versus unregistered (bearer)
- legal title
- beneficial interest
- voting rights
- right to participate in corporate actions

7.1.5 understand the basics of designated and pooled nominee accounts and their uses, and the concept of corporate nominees:

- designated nominee accounts
- pooled nominee accounts
- details in share register
- function of corporate nominees
- legal ownership
- beneficial ownership
- effect on shareholder rights of using a nominee

7.1.6 understand the concepts, requirements, benefits and disadvantages of deals executed cum, ex, special cum and special ex:

- timetable
- effect of deals on the underlying right
- effect on the share price before and after a dividend
- the meaning of 'books closed', 'ex-div' and 'cum div', 'cum' and 'ex-rights'
- effect of late registration
- benefits that may be achieved
- disadvantages / risks
- when dealing is permitted

7.1.7 understand Continuous Linked Settlement (CLS) and its purpose:

- the settlement of currencies across time zones
- receiving and matching instructions
- advantages
- how it reduces settlement risk (Herstatt risk)

7.1.8 know the application of distributed ledger technology

7.2 Stock Borrowing and Lending

On completion, the candidate should:

7.2.1 know the uses of requirements and implications of stock lending:

- what is stock lending
- stock lending versus repo
- purpose for the borrower
- purpose for the lender
- risk

7.2.2 understand the function of stock borrowing and lending intermediaries (SBLIs), including:

- use of custodian banks
- administration, including collateral
- regulation
- effect on the lender's rights
- lender retains the right to sell

Element 8 Accounting Analysis

8.1 Basic principles

On completion, the candidate should

8.1.1 understand the purpose and uses of financial statements

- 8.1.2 know the five components of a financial statement
- 8.1.3 understand the requirements for companies and groups to prepare accounts in accordance with applicable accounting standards and the difficulties encountered when comparing companies using different standards
- accounting principles
 - International Financial Reporting Standards (IFRS)
 - International Accounting Standards (IAS)
- 8.1.4 understand the differences between group accounts and company accounts and why companies are required to prepare group accounts. (Candidates should understand the concept of goodwill and minority interests but will not be required to calculate them).

8.2 Statement of Financial Position

On completion, the candidate should:

- 8.2.1 know the purpose of the Statement of Financial Position, its format and main contents
- 8.2.2 understand the concept of depreciation and amortisation
- 8.2.3 understand the difference between share capital, capital reserves and revenue reserves
- 8.2.4 know how loans and indebtedness are included within a Statement of Financial Position

8.3 Statement of Comprehensive Income

On completion, the candidate should:

- 8.3.1 know the purpose of the Income Statement, its format and main contents
- 8.3.2 understand the difference between capital and revenue expenditure

8.4 Statement of Cash Flows

On completion, the candidate should:

- 8.4.1 know the purpose of the Statement of Cash Flows and its format as set out in IAS 7

8.4.2 understand the difference between profit and cash and their impact on the long term future of the business

8.4.3 understand the purpose of free cash flow and the difference between enterprise cash flow and equity cash flow

8.5 Additional information

On completion, the candidate should:

8.5.1 know additional information that can be used to analyse company performance contained within:

- the Annual report
- Auditor's report

8.6 Financial Statements Analysis

On completion, the candidate should:

8.6.1 understand the importance of analysing financial statements in context for an informed assessment

8.6.2 understand the relationship between share price and financial statement information

8.6.3 understand the purpose of ratio analysis and its limitations

8.6.4 be able to calculate the following ratios:

- profitability ratios (gross profit and operating profit margins)
- liquidity ratios (current ratio, Quick/ acid test)
- debt ratios
- asset management ratios (turnover)

8.6.5 be able to calculate the following key ratios:

- return on capital employed (ROCE)
- return on assets (ROA)
- return on shareholders equity (ROE)

8.6.6 be able to calculate the following financial gearing ratios:

- investors' debt to equity ratio
- net debt to equity ratio
- interest cover

8.6.7 be able to calculate the following investors' ratios:

- earnings per share (including diluted earnings per share)
- price earnings ratio (both historic and prospective)
- gross dividend yield
- gross dividend cover
- enterprise value to EBIT
- enterprise value to EBITDA
- earnings per share
- diluted earnings per share

Element 9 Investment Management

9.1 Risk and Reward

On completion, the candidate should:

9.1.1 know the basics of risk and reward

- assessment of returns
- types of risk
- quantifying risk

9.1.2 understand the risk and reward of investment in equities:

- risk profile
- effect of long term investment
- can offer income and capital appreciation
- purpose and use of dividends

9.1.3 understand the risk and reward of investment in money market instruments:

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- risk profile
 - use as short term investment
- 9.1.4 understand the risk/reward of investments in debt (fixed interest, floating rate and index linked):
- compared to equities
 - effect of holding to maturity
 - can combine low risk and certain return
 - can provide a fixed income
 - inflation risk
 - interest rate risk
 - default risk
- 9.1.5 understand the risk profile of investments in overseas shares and debt:
- country risk
 - exchange rate risk
- 9.1.6 understand the risks facing the investor:
- specific / unsystematic
 - market / systematic
 - interest rate risk
 - inflation risk
- 9.1.7 understand how to optimise the risk / reward relationship through the use of:
- correlation
 - diversification
 - use of different asset classes
- 9.1.8 know the role of hedging in the management of investment risk and how to achieve it:
- futures
 - options

- CFDs

9.1.9 understand the general concept of ranking in respect of shares and corporate bonds in the event of a company's liquidation

9.2 Institutional Investment Advice

On completion, the candidate should:

9.2.1 know the requirements of different institutional investors:

- pension funds
- life and general insurance funds
- hedge funds
- regulated mutual funds
- banks
- ESG funds

9.2.2 Understand the need for the publication of regulatory information and financial communications and the types of entity through which publication is achieved

- PIPS
 - RNS
- SIPS
 - Bloomberg
 - Reuters
- analyst research

9.3 Approaches to investment

On completion, the candidate should:

9.3.1 understand active investment management methodologies and strategies and their advantages and disadvantages

9.3.2 understand passive investment management methodologies and strategies and their advantages and disadvantages

9.3.3 understand the approaches to ESG investment and their advantages and disadvantages

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