

INSTITUTE OF ACTUARIES OF INDIA

EXAMINATIONS

1st September 2021

Subject SA7 – Investment and Finance

Time allowed: 3 Hours 30 Minutes (14.30 - 18.00 Hours)

Total Marks: 100

INSTRUCTIONS TO THE CANDIDATES

- 1. Please read the instructions to examinees sent along with hall ticket carefully and follow without exception.*
- 2. The answers are expected to be India Specific application for the syllabus and corresponding core reading. However, substantially the core reading material is still taken from material supplied by Actuarial Education Company which is meant for UK Fellowship examination. The core reading also contains some material which is India Specific, mostly the IRDA regulation. In view of this, it should be noted that focal point of answers is expected to be India Specific application. However, if application specific to any other country is quoted in the answer the candidate should answer the question with reference to Indian environment.*
- 3. Mark allocations are shown in brackets.*

Q. 1) The Board of a life insurance company has decided to invest in privately held unlisted companies particularly start-ups with innovative product or process to diversify its investments across asset classes. The Company's CEO has asked its Chief Investment Officer (CIO) to make an investment strategy document and process for investing in this asset class keeping in mind the risk-return trade-off.

i) What drives Investment strategy of a life insurance company? (2)

ii) Please prepare a document for the board highlighting objectives, strategy and process for investment in privately held unlisted companies. (12)

The investment process regards to valuation and due diligence needs special consideration as these companies are privately held and unlisted. Valuation Process for these companies may require some innovative approach to project the cash flows and arrive at future growth assumptions.

iii) Explain the information required for valuation of the companies. (6)

The CIO has identified two start-up companies one in FinTech domain and the other one in Travel industry (travel portal). According to the CIO these investments are good investments considering their business model, financial plan and experience of the promoters. The CIO is also aware of the fact that such investments are risky and require a proper fundamental analysis to assess the company and worth of the shares. At the present time the analyst believes that due to Pandemic, the FinTech company will perform better while travel portal company may continue to experience slowdown.

iv) Explain how the economic scenario described above and other factors that may affect the performance of FinTech Company and Travel Portal. (10)
[30]

Q. 2) The growing importance of ESG or environmental, social and governance in India is now also being reflected in the capital-raising plans of India. A technology company wants to raise funds.

i) You are an ESG expert and a technology company has asked you to plan a 5 year ESG vision and ambition for the company. Please identify possible vision and action points on each of the 3 components - environmental, social and governance. (12)

ii) Explain the various stages of ESG investment process. (12)
[24]

Q. 3) The board of directors of a large investment firm that has significant presence in domestic market has been concerned for some time that the scope for continued growth in the business is becoming more limited due to changing market place. The investment firm has been focussing on conventional equity and bond investment management and provided its services primarily for institutional investors.

You are working as an investment consultant to a specialist in the firm. The board is now actively considering setting up a hedge fund operation. You have been asked to compile a report, which will set out key factors that must be considered before embarking on the new strategy. In particular, your report should set out the following:

- i) List down some of the factors that may have impacted the growth of the firm listing giving specific examples from developments in Indian market/economy. (6)
- ii) List some of the key characteristics of hedge funds and some of the structures that are commonly available in the market. (7)
- iii) The advantages and disadvantages of the various methods open to the board for entering the hedge fund market. (12)

[25]

Q. 4) A medium size Indian life insurance company is a specialised insurer dealing only with annuity business and have significant portion of liabilities in the form of pensions in payment to existing annuitants. Assets backing this liability are ring-fenced and are currently invested in an actively managed bond portfolio, with a small allocation to an index-linked equity portfolio. The insurer has always been fully solvent meeting all regulatory norms, but a recent valuation shows that the solvency levels has fallen below the regulatory minimum.

- i) Suggest the main possible reasons that may have led to the solvency level falling below regulatory minimum. (4)

The board has expressed concern at the recent valuation results. The company's financial director has suggested that the fund adopts a more closely matched investment strategy for the assets backing the liabilities. She has already held discussions with the leading investment consulting firm who has suggested that the fund should enter into an interest rate swap in order to hedge the liabilities.

- ii) Explain how interest rate swaps can be used to hedge the investment risks associated with the annuity portfolio. (4)
- iii) Discuss the main issues that the trustees should consider before deciding to hedge using swaps, as well as the advantages and disadvantages of the consultants proposal. (10)
- iv) Please outline the types of derivatives allowed by IRDAI along with the purpose for which they are allowed. (3)

[21]
