Institute and Faculty of Actuaries

Module 12
Pensions Management

for Albania/Kosovo

2015/2016/2017

1 January 2016

Aim

The aim of Module 12 Pensions Management is to instil in successful candidates the ability to apply, in simple situations, the mathematical and economic techniques and the principles of actuarial planning and control needed for the operation on sound financial lines of providers of pensions or other employee benefits.

Objectives

On completion of this subject the candidate will be able to:

(a) Define the principal terms used in the provision of pensions. (Unit 1)

(b) Describe the role that each of the following parties may play in the provision of pensions and other benefits: (Unit 2)

- the State
- employers or groups of employers
- individuals or groups of individuals

(c) Compare alternative systems of social security, mandatory individual accounts, occupational pension schemes and personal pensions. (Unit 3)

(d) Describe the ways in which the parties in (b) may meet their needs in relation to: (Unit 4)

- the forms and levels of benefits that may be needed by individuals
- the financing and non-finance related needs of different sponsors
- the regulation of non-State provision

(e) Discuss the implications, for the parties in (b), of the environment in which benefits are provided in terms of the effect of: (Unit 5)

- different presentation and reporting of benefits and contributions
- any professional guidance for actuaries or other professionals

(f) Describe the ways in which providers may be able to finance the benefits to be provided in terms of: (Unit 6)

- the alternatives that may exist relating to the timing of contributions relative to benefit payments

- the forms and characteristics of investment that may be available if contributions are made before benefits are due for payment

(h) Discuss the factors to consider in determining a suitable design for a defined benefit scheme, in terms of benefits and contributions, in relation to: (Unit 8)

- the level and form of benefits to be provided
- the method of financing the benefits to be provided
- the choice of assets when benefits are to be funded

(i) Describe the risks and uncertainties affecting: (Unit 9)

- the level and incidence of benefits
- the level and incidence of contributions
- the level and incidence of return on assets when benefits are funded
- the overall security of benefits

(j) Discuss the use of actuarial models for decision making purposes in non-state pensions, in terms of: (Unit 10)

- the objectives of and requirements for building a model for the management of the provision of pensions and other benefits
- the basic features of a model required to project income and outgo
- the use of these models for setting contributions and assessing the return on assets when benefits are funded
- how sensitivity analysis of the results of the models can be used to help decision making

(k) Discuss the application of actuarial methods and techniques to the financial management of a social security scheme in: (Unit 11)

- the process of population projection and its main determinants
- evaluating the liabilities in terms of emerging costs using a collective method
- analysing the yield from a given contribution structure
- showing how contribution levels can be assessed on a pure pay-as-you-go basis and using an average premium to smooth contributions over time

(l) Discuss the principles behind the determination of assumptions for valuing future benefits and contributions, having regard to the management of risk and the return on capital, in terms of: (Unit 12)

- the types of information that may be available to help in determining the assumptions to be used

- the extent to which each type of information may be useful, and the other considerations that may be taken into account, in deciding the assumptions

- the possible objectives of the various parties involved

(m) Discuss the principles behind the determination of discontinuance terms in respect of benefits, in relation to how the following may be taken into consideration when determining discontinuance terms: (Unit 13)

- rights of beneficiaries
- other benefit expectations
- the availability and selection of a method of provision of discontinuance benefits
- the level of available assets

(n) Discuss how to determine values for assets, future benefits and future contributions, in terms of: (Unit 14)

- the data requirements

- the need for placing values on assets, future benefits and contributions and the extent to which values should reflect risk management strategy

- the reasons why the assumptions used may differ in different circumstances

- the reasons why the assumptions and methods used to place a value on guarantees and options may differ from those used for calculating the reserves needed

- how sensitivity analysis can be used to check the appropriateness of the values
- and be able to perform calculations to demonstrate an understanding of the valuation methods

(o) Discuss the application of actuarial methods and techniques to the design and financial management of defined contribution pension schemes in: (Unit 15)

- establishing the fairness, viability and robustness of the contribution structure
- considering the need for and insurance of additional risk benefits, such as those payable on death or ill health before retirement
- setting annuity rates for conversion of individual accounts into pension
- establishing provisions and monitoring the finances of the annuity provider
- advising members on their retirement income planning and scheme sponsors on establishing appropriate levels of contribution
- evaluating the costs of minimum pension guarantees
- establishing provisions for financial guarantees and future operating expenses

(p) Analyse the asset-liability matching requirements of a provider of pensions and related benefits in relation to the trade-off between risk and reward, and describe how projection models may be used to develop appropriate strategies. (Unit 16)

END OF SYLLABUS