




5 credits

30.0 h + 15.0 h

Q1

Teacher(s)	de Valeriola Sébastien (compensates Denuit Michel) ;Denuit Michel ;
Language :	French
Place of the course	Louvain-la-Neuve
Main themes	Development of statistical methods in order to price non life insurance
Aims	<p>The purpose of this course is to give an introduction to the pricing of non life insurance products.</p> <p>1 At the end of this course the students must be able to determine the optimal management of the risks taking into account their characteristics.</p> <p>-----</p> <p><i>The contribution of this Teaching Unit to the development and command of the skills and learning outcomes of the programme(s) can be accessed at the end of this sheet, in the section entitled "Programmes/courses offering this Teaching Unit".</i></p>
Evaluation methods	Class participation and written examination in French
Teaching methods	<p>In-class activities: o Lectures o Exercices/PT</p> <p>At home activities: o Exercices to prepare the lecture Paper work</p>
Content	<p>Content The following topics will be developed: - Historical perspective - Fundamental principles of risk management - Optimal policy of risk management - from the individual to the collective model - solvency margins and stop loss premiums Methods In-class activities X0 Lectures X0 Exercices/PT At home activities X0 Exercices to prepare the lecture X0 Paper work</p>
Bibliography	<p>Les transparents se basent principalement sur</p> <ul style="list-style-type: none"> • Denuit, M., Charpentier, A. (2004). Mathématiques de l'Assurance Non-Vie. Tome I: Principes Fondamentaux de Théorie du Risque. Collection Economie et Statistique Avancées, Economica, Paris. • Denuit, M., Charpentier, A. (2005). Mathématiques de l'Assurance Non-Vie. Tome II: Tarification et Provisionnement. Collection Economie et Statistique Avancées, Economica, Paris.
Faculty or entity in charge	LSBA

Programmes containing this learning unit (UE)				
Program title	Acronym	Credits	Prerequisite	Aims
Master [120] in Actuarial Science	ACTU2M	5		
Master [120] in Statistics: General	STAT2M	5		
Master [120] in Mathematical Engineering	MAP2M	5		
Master [120] in Mathematics	MATH2M	5		