

AEN Newsletter

Welcome to the fourteenth newsletter for Actuarial Educators Network members. This edition follows up on the results of a MOOC launched by The Australian National University in conjunction with edX and opens the possibility for actuarial educators to join some of the several meetings that are taking place this year. We would also like to encourage you to follow and review the information included on the link for the submission of abstracts to the International Congress of Actuaries that will take place in Berlin, Germany, in 2018 (ICA 2018). Please do not hesitate to submit information of relevance for actuarial educators to <u>Karla Zúñiga-Cortés</u> from the IAA secretariat as we are looking to increasing the exchange of information amongst actuarial educators around the world.

An update on the Massive Open Online Course (MOOC) "Introduction to Actuarial Science"

By Adam Butt

Just over a year ago, I wrote an article in the 12th AEN newsletter about "Introduction to Actuarial Science", which you can find by <u>clicking here</u>. That article was published one month before the course went live and now is a good time to write again and let you all know how this <u>Massive Open Online Course</u> is going.

Whilst I'd encourage you to read the previous article if you want a more detailed background on the course, by way of brief introduction the purpose of the course is to provide those considering an actuarial career with a free and interactive experience that will give them an idea of what an actuary is and does. The course is free to enrol in and can be found <u>here</u>.

The course commenced on 17 October 2015, and ran in a synchronous format until 14 December 2015 (i.e. course material was released in weekly fashion to a cohort of students taking the course at the same time). Following on from this the course was opened in a self-paced format from 22 December 2015 onwards (i.e. all course material is immediately available upon enrolment in the course), and is currently running in this format.

The course is made up of a number of short videos, interspersed with questions related to the video material. Students engage with the instructor (myself) and each other through discussion forums. For a one minute "highlights package" of the videos of the course <u>click on this YouTube link</u>.

An example of a question asked to students in a latter portion of the course can be seen below (this is a screenshot from the interface of the course):



Assessment Question 6.8

1.0 point possible (graded)

The whole of life policy described in this Lesson is updated to have a fixed term of 30 years, where the \$400,000 claim is paid upon the end of the year of death, or if death does not occur in the next 30 years, then the \$400,000 is paid in exactly 30 years and the policy ceases immediately. This is known as an endowment policy.

Update the demonstration file for the simulations to take into account the revised policy design, keeping all other values (interest rates, mortality rates, number of policies sold, etc.) the same. Calculate the premium (to the nearest whole dollar) to be charged to give a 90% probability of being sufficient to cover the claims cash flows.



Save Show Answer

We've been very pleased with student numbers and response to the course, with students from over 180 countries having enrolled in the course. Details of student numbers as at 18 November 2016 can be found in the table below.

Course version	Synchronous	Self-paced
Total enrolments	11,490	17,176
Attempted first question of first Lesson	1,793	3,072
Attempted first question of second Lesson	1,059	1,344
Attempted final question of Final Exam	236	212
Passed the course	472	350

In order to pass the course students must obtain a mark of at least 40%. The drop off numbers in the table above are consistent with the experience of other MOOCs, noting that the vast majority of "enrolments" are people who just want to have a quick look at the course and have no intention of actually taking it. (The marketing people love the "total enrolment" numbers – the critics love the completion rates – the truth is somewhere in between).

The course currently has a 4.5/5 rating from 14 reviews on edX, with a number of very positive comments. It is heartening to read comments like:

"For anyone thinking of the US exams, I think this is a better first step toward becoming an actuary than focusing on statistics & probability for the first exam since this gives a better impression of what the professional environment and processes might be like."

Information from surveys of students we undertook during the course paints an interesting picture as well. The following summary statistics come from the synchronous version of the course:



- Around 60% of students who completed the opening course survey (1,624 responses) were considering or already doing actuarial degrees/exams, with 38% just generally interested in the profession and 2% already actuaries.
- Around 46% of students who completed the closing course survey (147 responses) were intending to start an actuarial degree/exams in future, with 15% already doing an actuarial degree/exams and intending to continue doing so.
- Of those intending on starting or continuing an actuarial degree/exams, 21% had not intended on doing this before taking Introduction to Actuarial Science.

There is lots more I could say about the course but let's keep this (relatively) brief! In the meantime if you would like to know more please feel free to send me an email and please continue to spread the word about the course!

2017 Actuarial Teaching Conference

The Society of Actuaries (SOA) is pleased to announce that the 2017 Actuarial Teaching Conference (ATC) will be held on June 26-27, 2017, in Pittsburgh, PA. The ATC will provide an opportunity for all faculty members engaged in actuarial teaching to come together, participate in learning sessions, share ideas, network with each other, and learn more about the SOA and the actuarial profession. The event will include an evening networking reception followed by a full day of sessions on day two. The modest \$90 registration fee will include the networking reception as well as breakfast and lunch on the second day. All are welcome!

Registration will be made available in the coming weeks on the SOA Calendar of Events. Be sure to check the events page regularly for any updates.

We hope to see you there!

University of Leon. Looking for International Partnerships

The university staff offering an MSc in Actuarial and Financial Science (formerly Degree in Actuarial and Financial Science and Master in Finance) from the University of Leon is looking to create a partnership agreement with an international institution offering a similar type of Masters degree.

During the two formation years, our MSc in Actuarial and Financial Science fully covers the Core Syllabus for Actuarial Training in Europe set by the Actuarial Association of Europe. The syllabus consists of five main modules: Actuarial and Financial Modelling (54 ECTS), Finance (48 ECTS), Legal, fiscal and regulatory environment (18 ECTS), Business Practices (6 ECTS), and Master's Thesis (6 ECTS). Our students are also offered the option of taking one or two semesters in a reputable institution abroad added to participate in internships at either influential Consulting and Advising business, or banking leading business in the Spanish market.

Although a small college, University of Leon is proud to be involved in forming professionals of high-calibre in the Actuarial Sciences field. The low number of carefully selected students guided by elite teaching staff creates a perfect learning environment. Given the exceptional personal and professional advantages that an international experience provides, we strongly support and encourage our students to look at exchange opportunities. We would be delighted to welcome you to our lovely city and to make partnering a reality. For more information, please do not hesitate to contact Carmen González Velasco at mcgonv@unileon.es





IFoA Call for Research: Behavioural Aspects of Institutional Investment Decision-Making

The Institute and Faculty of Actuaries (IFoA), through its Actuarial Research Centre, is inviting research teams and organisations to submit proposals for a research project on behavioural finance.

Timeline:

- Opening date: 20 February 2017
- Closing date: 21 April 2017 (17:00 UK time, BST)
- Expected award: Mid May 2017
- Expected commencement: June 2017 onwards

Call description:

The objective of this Call for Research is to explore the decision-making of institutional investors, in particular insurers and pension schemes, especially the biases that may affect their investment decisions. This could include, but be not limited to, emotional, psychological and political biases. It is expected that the project will first explore what "rational" or "optimal" behaviour could be expected from an institution in certain economic scenarios, based on its investment objectives and underlying values.

It will then explore whether there is solid evidence that "behavioural" factors, such as human psychology, company culture, corporate politics and conflicts of interest, cause them to deviate from optimal behaviour. The research should then make practical conclusions that could be used by actuaries working in investment and related areas. For example, one possible output of the research could be a suggested governance structure an organisation could put in place to manage these biases and conflicts. The IFoA is seeking research that has impact and practical application.

The IFoA has allocated funding of up to £200,000 to this proposal. This grant may be split across more than one research team depending on the scope and content submitted by respondents. For detailed information, please follow <u>this link</u>.

CPD Opportunities

ACTEX offers a variety of online training and learning opportunities to fulfill SOA/CAS/EA professional development requirements and build students' skills through on-demand e-courses and live webinars. Our growing line of professional development opportunities are designed for actuaries and candidates looking to deepen and broaden their understanding of actuarial work, or expand actuarial knowledge outside of their specific area of practice. Recent session topics have included: best practices in Excel and VBA, predictive analytics and baseball, GAAP, ERM, and microinsurance.

NEW: We are pleased to offer a 50% discount to Full-Time students and a 20% discount to faculty members of any accredited higher-education institution off of our live & recorded webinars. We are always interested in working together with international associations and universities to accommodate special programming or group-pricing requests. In order to access these discounts, please contact us via email (<u>Support@ActexMadRiver.com</u>) using your college/university e-mail address.



Country	Event	Dates	Host
Chile	International Seminar AIOS-ASSAL	17-18 April, 2017	ТВА
Mexico	PBSS Colloquium	4 – 7 June, 2017	Casa Magna Marriott Cancun Resort,
			Cancun
United	2017 Actuarial Teaching	26-27 June, 2017	Hotel Monaco, Pittsburgh.
States	Conference (ATC)		
Panama	ASTIN/AFIR-ERM Colloquium	20 – 24 August,	Sheraton Panama Hotel and
		2017	Convention Center, Panama City.
Germany	31 st International Congress of	4 – 8 June, 2018	Estrel Hotel, Berlin.
	Actuaries ICA-2018. Call for papers		

Future Meetings for Actuarial Educators

Recent Publications



Estadística Actuarial

Actuarial Statistics

Author: Evaristo Diz
Edition: 1st Edition
Publisher: Ediciones de la Universidad Colombia
Date: October 2013
Description: This first edition of Actuarial Statistics treats the basic foundations of statistical methods and models for insurance data analysis, curve fitting, distribution fitting and also linear and nonlinear modeling of insurance issues, premium determination, Chain Ladder and several other applications. Due to its pragmatic orientation, it is a valuable comprehensive resource for those working in the insurance/actuarial field, whether they are actuaries, Risk managers, or policy makers. Available in Spanish only.

Call for Papers

The Journal of Insurance Issues

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The Official Journal of the Western and Southern Risk and Insurance Associations

The <u>Journal of Insurance Issues</u>, established in 1977, welcomes original article submissions of analytic or empirical merit in the areas of insurance, risk, and related disciplines. The *JII* is a double-blind, peer-reviewed academic journal. All issues of the *Journal of Insurance Issues* are available online through <u>JSTOR</u>.

Manuscripts must not have been published in, or submitted for concurrent review with another journal. Successful authors will be required to submit the final version of their papers in MS Word and to assign copyright to the *Journal*'s publisher.

In addition to JSTOR, the *Journal* is listed in Cabell's and is also found in ProQuest, EconLit, RePec. Each year, one particularly outstanding article from *JII* is selected for the prestigious <u>Donald Hardigree Award</u>. For more



information about the submission and review process, the *JII*, or its sponsoring associations, see the *Journal* website: <u>www.insuranceissues.org</u>. All submissions should be sent to <u>journalofinsuranceissues@gmail.com</u>.

Yu-Luen Ma and Nat Pope Co-Editors, *Journal of Insurance Issues*

AWB: Global Remote Mentorship Program

Actuaries Without Borders (AWB[®]) approved the launching of a pilot program focusing on global remote mentorship services supported by global remote exam tutoring. Initially, this program will be rolled out in a limited scale and it will focus on actuarially developing countries. Once the infrastructure is established, this program could be expanded globally to cover many countries in the world.

In the pilot phase, remote exam tutoring services will be provided by leveraging on qualified actuaries-teachers participating in overseas AWB seminars. In the next phase, remote mentorship and remote exam tutoring services will be combined using a shared infrastructure.

The remote mentorship program provides the following benefits to the global society:

1. Assistance in the development of the actuarial profession where there is a lack of such resources.

2.Contributes to the awareness of the actuarial profession and the spread of actuarial education by encouraging qualified actuaries and academics across the world to volunteer in global mentoring, including actuarial exam tutoring, through a convenient platform available around the clock.

This program is not intended to provide free consulting services, executive coaching, personal life coaching, career coaching, etc. It is restricted to non-commercial use. For more information, please visit the <u>Global</u> <u>Mentorship Program</u> section of the AWB website.

Other projects

On-line text – Loss Data Analytics Project from the University of Wisconsin

Tired of hearing from your students about the exorbitant price of textbooks?

Want to help provide a modern text for actuarial students in developing (e.g., Latin American) countries?

We (a group of actuarial educators) invite you to learn more about an exciting project just underway. The initial focus is on what we are calling "Loss Data Analytics" although this may be the start of something broader. It is meant to cut across traditional boundaries by being available freely, have interactive capabilities, and be translatable (is that a word?) on the fly. As with statistical software (e.g., "R"), we hope to develop an actuarial community that will work collaboratively in developing our textbooks of the future.

Rather than write a lot here, please check out the following URL where we describe the project <u>https://sites.google.com/a/wisc.edu/loss-data-analytics/</u>



Specifically, at the site you will see opportunities for commenting our proposed syllabus as well as suggestions as to how you can become involved.

Thanks for considering this request.

For the project team, Edward W. (Jed) Frees Margie Rosenberg Emil Valdez

Opportunities around the World

Canada:

The University of Waterloo's Department of Statistics and Actuarial Science invites applications for <u>three</u> <u>definite-term lecturer positions</u>. These appointments have an initial term of three years with an expected start date of September 1, 2017.

Egypt:

The American University in Cairo (AUC) invites applications for <u>three full-time tenure-track faculty positions</u> at an assistant or associate professor level; one position in each of the following areas: Mathematics, Statistics, and Actuarial Science, beginning Spring 2017 or Fall 2017.

Final Comments

We are currently welcoming any education news article, information on future education conferences, lecturing opportunities around the world, or publications on actuarial science. Should you have any such information, please do not hesitate to forward it to Karla Zuniga (<u>karla.zuniga@actuaries.org</u>) for consideration on future newsletters. We are looking forward to receiving your material.

If you know of any educators, or people interested in actuarial education, who would be interested in the network, please encourage them to join by filling out this online form (http://www.actuaries.org/AEN/Membership.cfm).

You are receiving this newsletter because you are currently on our e-mail distribution list. We would very much like you to remain part of the network, but if you do want to opt out, or are receiving this e-mail in error, please inform Karla Zúñiga (karla.zuniga@actuaries.org) who will remove you from the distribution list.