

Report of “Jornada de presentación del MOOC de Toxicología (TOX-OER platform presentation Meeting)” as first Multiplier Event

On December 16th, 2016 at the Faculty of Pharmacy of the University of Salamanca (Spain), the first TOX-OER dissemination event was held.

The purpose of this briefing was to present the schedule of the TOX-OER MOOC and show the platform designed to professionals from different areas who may be interested in the study of Toxicology.

This event was previously announced in various ways in order to make it known to as many people as possible. An informational poster was made and sent to institutions such as the Spanish Association of Toxicology (AETOX, of its acronym in Spanish) from where it was published on its website. In this way professors of other Spanish universities knew the existence of this event. Promotion emails were also sent to various Spanish and foreign institutions that may be interested (Universities, Police, Research Centres, Hospitals Primary Care Centres, Secondary Education Centres, Training Centres, pharmacies and pharmaceutical services...).

The event was attended by 68 people. The signature of all those attendants who did not belong to any institution of the consortium was collected. In particular 55 participants came from institutions related to Toxicology and represented all those target groups to which the project is addressed.

Toxicology professionals from 10 foreign institutions attended the event (Table 1). In particular, teachers from 2 Portuguese Universities (Lisbon and Coimbra); 1 Student from an Italian University, 6 researchers from 6 research centres (2 from England, 1 from Switzerland, 1 from France, 1 from Italy and 1 from the United States) and 1 Pharmaceutical Prescriber from Scotland.

The national representation was very broad (Tabla 2). The Higher Education area was the most represented by the assistance of Professors from 11 different Spanish universities: Universidad de la Laguna, Universidad de Valladolid, Universidad Rey Juan Carlos, Universidad de Sevilla, Universidad de Valencia, Universidad San Pablo CEU, Universidad de Cordoba, Universidad de Alcalá, Universidad de Extremadura, Universidad de Murcia, Universidad Complutense de Madrid. The total number of professors who came from these institutions was 16.

Secondary education was also represented through the assistance of 9 teachers who came from 3 Secondary Education Centres and 2 Vocational Training Centres.

From the biosanitary area we have the presence of 3 Primary Care Pharmacists, 2 from the “Servicio Extremeño de Salud” and 1 from the “Junta de Castilla y León” ; 1 Family Doctor also from the “Servicio Extremeño de Salud” and 1 Sanitary Inspector.

As environmental professionals, the event was attended by 2 veterinarians from the company “Medio Ambiente Higiene y Calidad Alimentaria” from Plasencia (Cáceres).

From the industrial sector, representatives of two Biotech companies came 1 from “Nanovex Biotechnologies and 1 from Cytognos.

Finally, another target group established in the project, the Security Forces, were represented through the assistance of 1 Head of scientific police (National Police Corps, Salamanca Police Station).

In addition, two partners from other Universities members of the project participated in this event, namely Stefano Girotti from the University of Bologna and Fernando Remião from the University of Porto. They presided over the event at the presentation table along with Professor Ana Isabel Morales, Head of the Area of Toxicology of the University of Salamanca and coordinator of TOX-OER project, and Esther Caballero, Vice Dean of teaching of the Faculty of Pharmacy (University of Salamanca).

The event began at 9.45 h with the delivery of documentation to attendees financed through the project. Each participant was given a folder with folios and pen and a calendar made with images and phrases from the TOX-OER website, with the aim that this calendar remind them, throughout the year, the existence of the platform. In addition, all the people received an accreditation to be identified during the event.

At 10.15 h the act was inaugurated by Esther Caballero in the “Room of Degrees” of the Faculty of Pharmacy. Then, Ana Isabel Morales explained what the TOX-OER project consisted of, introduced the partners of the consortium and showed the utilities of the platform. In this talk the syllabus was presented and the content, structured in different modules and submodules, was exhaustively explained. Also she encouraged all attendees to spread their use among peers and students.

After a short rest, the attendees went to the computer room where they were able to access the platform and view its contents. For 2 hours they could access to various courses, watch videos, read articles and even answer self-assessment questions. This time also served for the organizers to share impressions with attendees. In addition, the partner of Bologna used the assistance of toxicology professionals to explain to the audience the event which will be held in Bologna on January 18th, 2017.

At the end of the event, attendees answered, anonymously, a questionnaire of satisfaction with the event, with questions about the event, platform and contents.

As a final point of this event, a meal was held in the “Library Room” of the “Colegio Arzobispo Fonseca” to which were 23 people between organizers and attendees to the event that had previously confirmed attendance at the meal. This social event served to bring the organizers closer to the audience and to share impressions about the usefulness of the platform, suggestions for improvement, solving doubts, etc. Attendees made positive comments on the platform and said it would be useful in their professional field.

After the event, the satisfaction surveys were analysed and the results were as follows:

93% of the participants answered these surveys.

The degree of satisfaction observed in the surveys was very positive. Attendees valued different aspects of the event selecting among the options: very low, low, medium, high, very high.

The first block of questions was related to the event (organization, information, appropriateness of the physical space, duration of the day, schedule ...). The answers of all the attendants were distributed between high and very high.

Similar result appeared in the second block of questions that was related to the TOX-OER platform. All participants agreed that the platform is visually attractive, the information is very well structured, access is easy and intuitive and they pointed out that it is very important that the material is in Spanish. These aspects were also highlighted in the comments section. In addition all of them answered positively to the question of if they were going to use the platform and if they were going to spread it in its surroundings.

Finally, in the third block of questions, the utility of module 5.3 was evaluated. Since this module was completely in Spanish and was the most consulted during the practical part of the event. The evaluation was also high and very high and in the comments punctuated the quality of the videos and the readings contained in the topic.

As suggestions for improvement, some participants proposed to unify the format of the videos of different modules and make some changes in the self-assessment.

The overall opinion of the event was very high.

Institution	City	Country	Assistants
Higher Education			
University of Lisboa	Lisboa	Portugal	1 Professor
University of Coimbra	Coimbra	Portugal	1 Professor
University of Napoles Federico II	Napoles	Italy	1 Student
Research			
Centre for tumour biology barts Cancer institute, Queen Mary of London	London	England	1 post-doctoral researcher
William Harvey Research Institute, Queen Mary of London	London	England	1 post-doctoral researcher
Department of Clinical Research, University of Bern	Bern	Switzerland	1 post-doctoral researcher
University of Messina	Messina	Italy	1 post-doctoral researcher
Aix-Marseille University	Marseille	France	1 pre-doctoral researcher
Stony Brook University	New York	United States	1 post-doctoral researcher
Biosanitary area			
West end Medical Practice	Edinburgh	Scotland	1 Pharmaceutical Prescriber

Table 1. List of assistants belonging to foreign (non-Spanish) institutions.

Institution	City	Assistants
Higher Education		
Universidad de la Laguna	La Laguna	1 Professor
Universidad de Valladolid	Valladolid	2 Professors
Universidad Rey Juan Carlos	Móstoles (Madrid)	1 Professor
Universidad de Sevilla	Sevilla	1 Professor
Universidad de Valencia	Valencia	1 Professor
Universidad San Pablo CEU	Madrid	2 Professors
Universidad de Cordoba	Cordoba	1 Professor
Universidad de Alcalá	Alcalá (Madrid)	1 Professor
Universidad de Extremadura	Cáceres	1 Professor
Universidad de Murcia	Murcia	1 Professor
Universidad Complutense de Madrid	Madrid	4 Professors
Secondary Education Centers		
Colegio Maristas Champagnat	Salamanca	1 Teacher
Colegio Antonio Machado	Salamanca	2 Teachers
IES Calisto y Melibea	Santa Marta de Tormes (Salamanca)	1 Teacher
Vocational Training Centers		
IES Fray Luis de León	Salamanca	4 Teacher
CEPA Arenas de San Pedro	Arenas de San Pedro (Ávila)	1 Teacher
Biosanitary area		
Servicio Extremeño de Salud”	Coria (Cáceres)	2 Primary Care Pharmacist 1 Family Doctor
Servicio de Salud, Junta de Castilla y León	Segovia	1 Primary Care Pharmacist
Sanitary Inspector, Junta de Castilla y León	Salamanca	1 Pharmacy inspector
Environmental		
Medio Ambiente Higiene y Calidad Alimentaria	Plasencia (Cáceres)	2 Veterinarians
Biotech company		
Nanovex Biotechnologies	Llanera (Asturias)	1 Scientific Director
Cytognos	Santa Marta de Tormes (Salamanca)	1 Flow Cytometry Specialist
Security Forces		
National Police Corps	Salamanca Police Station	1 Head of scientific police

Table 2. List of assistants belonging to Spanish institutions.

Analysis of the satisfaction survey with the MOOC TOX-OER Presentation Event

To know the opinion of those attending the conference on different aspects of the event. An anonymous questionnaire was given to all participants coming from non-partner institutions.

The percentage (%) of each response was calculated and presented below:

Satisfaction survey results. Event of December 16, 2016					
	1	2	3	4	5
General aspects					
Event organization	0,00	0,00	0,00	47,06	52,94
Information about the event	0,00	1,96	9,80	47,06	41,18
Adequacy of physical space	0,00	0,00	1,96	47,06	50,98
Usefulness of the delivered material	0,00	0,00	4,00	56,00	40,00
Event duration	0,00	0,00	4,00	48,00	48,00
Course Schedule	0,00	0,00	5,88	49,02	45,10
Overall view of the event	0,00	0,00	0,00	33,33	66,67
Aspects related to the TOX-OER platform					
Is visually attractive	0,00	0,00	1,96	31,37	66,67
Access is easy and intuitive	0,00	0,00	15,69	49,02	35,29
It is well structured in different modules	0,00	0,00	0,00	39,22	60,78
The material provided may be used	0,00	0,00	5,88	41,18	52,94
It is important that the material is in Spanish	0,00	0,00	0,00	33,33	66,67
The level of the courses is adequate	0,00	5,88	23,53	37,25	33,33
I will spread the existence of this course	0,00	0,00	5,88	33,33	60,78
Overall view of the platform	0,00	0,00	1,96	47,06	50,98
Aspects related to Topic 5.3. Effect of toxins on the kidney					
Meets the objectives established at the beginning of the course	0,00	0,00	1,96	49,02	49,02
The material provided as videos is of high quality	0,00	0,00	0,00	17,65	82,35
The material provided as text is of high quality	0,00	0,00	0,00	37,25	62,75
Complementary readings are interesting	0,00	0,00	3,92	52,94	43,14
Self-assessment is tailored to the information contained in the course	0,00	0,00	1,96	50,98	47,06
Overall view of the course	0,00	0,00	0,00	25,49	74,51

In addition the survey had a second part in which a series of questions were made and free space left to answer.

1. What aspects of the platform are particularly good? Why?

This question was intended to know the positive aspects of the platform

This question was answered by 21 people. Most of them (12) said that they liked the videos because they were very attractive and visual. The rest highlighted as a positive aspect the organization of content, availability in several languages, ease of access to content and the overall visually of the platform

2. What aspects of the platform could be improved?

This question was intended to know the negative aspects of the platform. 15 people answered this question. The comments were that the videos of the different modules should be more homogeneous, that they preferred the animation format to the teacher format narrating a theme. They also complained about the low volume of some videos

and that it had been difficult for them to access the platform. As a suggestion for improvement, it was proposed that the self-assessment should show the time available and that the correct response should appear at the end of the self-assessment

3. What contents are most attractive / interesting?

Again, the videos were the highlighted

4. What contents do you think are expendable?

Several participants agreed that there is excessive Environmental Toxicology content and little Clinical Toxicology

5. What contents do you think are missing?

In addition to the Clinical Toxicology mentioned in the previous question, they also commented that it would lack Forensic Toxicology as well as Risk Assessment.

One of the proposals was that the written text contained more images to facilitate comprehension and a glossary in each unit. It was also proposed to expand the bibliography

6. Suggestion for improvement

This section was added in case anyone had any suggestions that they had not mentioned in previous sections. There were no suggestions other than those mentioned above.