Security & Defence Learning 2008

The 4th International Forum on Technology Assisted Learning and Training for Defence, Security and Emergency Services

Post Forum Report

December 3, 2008
Hotel InterContinental Berlin

www.security-defence-learning.com

Within the last five years, the nature of education has changed dramatically. New technologies, teaching aids, methods of accessing information and means of communication have all had a profound effect on the nature and process of learning. So too has the emergence of a technologically savvy generation, which is comfortable with a wide range of communications media and keen to access education in imaginative new ways. As a consequence, modern education has begun to reach far beyond the boundaries of what, only a decade ago, would have seemed possible.

The development of astonishing new ICT solutions in the field of education and training has opened up a range of opportunities and challenges for teachers and trainers in the security, defence and emergency services sector. It has created a host of new possibilities. And it has left security planners with the urgent task of planning and training to meet a host of daunting, new threats.

Security and Defence Learning, the New Security Foundation's annual conference on technology-assisted learning for security, defence and emergency services, has become a leading platform for debate about how education and training can be improved to meet new security challenges. At **Security and Defence Learning 2008** in Berlin, leading practitioners, professionals and academics from around the world gathered for an insightful discussion about developing technologies, emerging threats and new opportunities.

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THE CONFERENCE PROGRAMME IN SUMMARY

**Security and Defence Learning 2008** focussed on four main themes:

- Recent developments and their implications for security and defence learning
- Improving the Operational Effectiveness of Police, Armed Forces and Emergency Services Through Technology-Assisted Learning and Training
- Content Production and Content Management for a New Generation
- New Challenges for Society

Opening the conference, the Chairman of the New Security Foundation, **Dr Harold Elletson**, drew the attention of delegates to the rapid pace of change in education and training, which had facilitated the development of imaginative new security solutions in every sector. **Dr Elletson** pointed out that what had been achieved in the last five years would have been unimaginable only a decade ago and the possibilities for further innovation were significant. However, the very developments that have made new solutions possible have also brought with them new dangers. Economic globalisation and new methods of communicating and transferring information have also benefited those who are bent on the destruction or disruption of society. It is important, therefore, to focus not simply on the benefits for security training of new technologies but also on the need to prepare for the range of threats that have now become part of our fast-moving, interlinked, networked and technologically complex modern world.

In the opening session of **Security and Defence Learning 2008,** delegates considered a number of fascinating case studies, illustrating both imaginative security solutions and the need to prepare effectively for the type of new threats implicit in a rapidly evolving security environment.

⠿ Participant Satisfaction

The Fourth International Forum on E-Learning for Defence and Security was attended by delegates from 19 different countries, providing an opportunity both for a truly global discussion of key issues in security training and for networking between learning professionals, solutions providers and end users.

Suficient 13%	Poor 0%	Very Good 21%
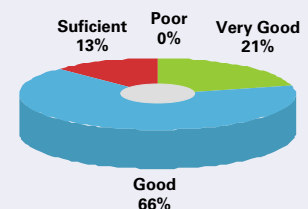
Good
66%

⠿ Feedback

"More relevant than ever to ever more urgent issues"

"All presentations were very good and useful"

"Productive + Instructive"

"Thank you for the interesting forum"

Lt. Col. Omar Begoidze, the Military Representative of the Georgian Mission to NATO, raised the issue of how a state can prepare to respond effectively to a cyber attack. This had also been highlighted at **Security and Defence learning 2007** by **General Johannes Kert** of Estonia, who had described the disruption of various state and private networks in what appeared to be a deliberately coordinated campaign against Estonian networks. In a presentation on "Cyber Security Issues Arising from the Russian Aggression Against Georgia", **Lt. Col. Begoidze** raised many of the same issues but in the context of the Russian intervention in Georgia, during which" the issue of cyber defence turned into a matter of special importance". A Black Energy Botnet was used for Distributed Denial of Service (DDOS) attacks and there was a systematic campaign of script-based denial of service attacks, defacement of web sites and attacks against email systems, in addition to the physical destruction of communications infrastructure. **Col. Begoidze** reported that the support

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>
> **Lt.Col. Omar Begoidze,**
> Military Representative of Georgia to NATO, Belgium

of external CERTS helped to limit the impact of the campaign on Georgian networks. In the future, however, Georgia intends to create alternative communication links and establish a nationwide cyber-defence organisation, which will have responsibility for additional training for cyber-attacks.

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>
> **Sean Nugent,**
> LINE Communications Group, UK

Three keynote speakers presented a series of case studies, illustrating innovative new training solutions. **Sean Nugent** of LINE Communications Group described a programme, developed by his company for the British Ministry of Defence, to provide cultural awareness and language training. With large numbers of troops currently deployed in Iraq and Afghanistan, he said that it was "essential that military service personnel are equipped with an awareness of the local culture, customs and language." The UK MOD had developed some successful face-to-face workshops but LINE's e-learning programme significantly enhances their impact and extends their reach. "With the right approach, e-learning is ideally suited to enhancing or even replacing face-to-face delivery", said **Nugent**. "It can minimise logistical difficulties and can be accessed at any time."

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In a fascinating presentation entitled "Tales from the Virtual Front – The Application of Serious Games in Security and Defence Learning", **Mark Coleman** of Qinetiq outlined the recent development of "serious games" and their increasing use for military and security training. **Luis Fernando del Signo** of TRALCOM attempted to answer the question, 'How to train 500,000 policemen in Mexico'. His answer, which included a detailed description of an innovative programme developed by his company, was that innovative e-learning is "the only way".

In a session on 'improving the operational effectiveness of police, armed forces and emergency services through technology-assisted learning and training', **Natascha Blijleven Tebbe**, Educational Technology Advisor at the Dutch Police Academy in The Netherlands, returned to the subject of serious gaming and described the creation of the virtual city of Behrloo, in which the Dutch police can use serious gaming technology for training purposes in a range of realistic scenarios. "The chief mission is achieving the learning objectives", **Ms Blijleven Tebbe** explained. "But we want to do it in an entertaining and challenging way".

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> **Natascha Blijleven Tebbe,**
> Dutch Police Academy,
> The Netherlands

In Germany, police forces are facing the introduction of new digital radio systems. **Uwe Seidel** of the Baden-Wuerttemberg State Police Headquarters said that this will mean that "in the next few years all authorities and law enforcement organisations will therefore require an enormous amount of further training for their employees as the future end-users of digital radio communication". **Mr Seidel** described the internet-based training programme, which has been developed by the Baden-Wuerttemberg State Police Headquarters, to meet this challenge. Their solution is available via an internet portal (www.digifunk.info) to law enforcement officers all over Germany.

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> **Alan Bruce,**
> Universal Learning Systems, Ireland

Dr Alan Bruce of Universal Learning Systems raised the issue of how to train modern police forces to cope with the challenges of diverse, multi-cultural modern societies. "There are new possibilities for policing to work with the opportunities offered to manage diversity in ways that produce benefit for all", he said. "It will call for training, education, practice and much new learning that challenges old stereotypes". **Dr Bruce** described the creation of "Diversity Works", with funding from the EU Peace II initiative, which has brought together police officers from both the Irish Garda Siochana and the Police Service of Northern Ireland for a joint training programme on diversity, anti-sectarianism and conflict resolution.

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Dr Alastair Gemmell, senior lecturer in geosciences at the University of Aberdeen, presented a case study of 'an interactive disaster management simulation exercise using mobile phones'. He explained that, during the simulation, students were "asked to imagine that they are the manager of civil defence utilities in a French town. Local weather conditions are changing and they must respond to changes to prevent a flood disaster... The activity is run in real time over a 72 hour period and the use of mobile phones allows the 'manager' to be contacted anywhere and make quick decisions to help control the situation. The simulation provides a personalised experience for each learner as the decision they make at each 'event horizon' determines their pathway through a decision tree to an appropriate scenario end point".

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> **Alastair Gemmel,**
> University of Aberdeen, UK

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>
> **Wolfram Spoenlein,**
> Motorola Technical Training Solutions, UK

In a session on 'content production and content management for a new generation', the conference considered how to make content relevant and accessible to a new generation. **Urs Widmer** of TATA Interactive Systems AG, described his company's development of "innovative didactical and technical approaches to train military people". **Wolfram Spoenlein** of Motorola Technical Training Solutions EMEA addressed the question of "the perfect learning solution for emergency services and why it's so hard to find". He concluded that the answer is that "it's all about people". **Mr Spoenlein** was speaking from the position of a communications supplier and systems integrator, providing learning solutions in the public safety market. "The training programmes we are working on now have to cater for the differing backgrounds within organisations of the post war and baby boomer generation, of Generation X and Generation Y. They have to take into account not only the different education but also the individuality of the learning styles and the expectation towards learning solutions."
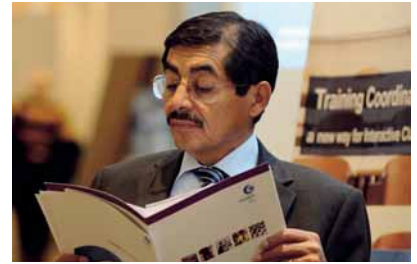
Andrea Lorenzon of Giunti Labs spoke about the content conversion challenges facing organisations in the defence community. "These challenges are now exacerbated by the fact that, up until now, technical publications and learning content have been stored in two separate repositories and these content types had no standard way to be delivered in an interoperable manner. Further complicating matters, recent changes in standards, technologies and policies have happened so quickly that few benchmark implementations are documented at any level that would supply substantive guidance". However, **Mr Lorenzon** stressed that "these conversion processes provide an excellent opportunity to revisit an organisation's learning platform architecture…".

In a presentation on 'Learning Content Management: Meeting the Challenges of Security and Defence Training through Centralised Content Development and Production', **Matthias Schulz** of OutStart GmbH said that "organisations around the world are faced with training challenges that affect the agility and productivity of their departments and staff". He presented case studies of Augusta Westland, the United States Navy and the Canadian Armed Forces to illustrate how organisations can use learning content management systems (LCMS) to meet new objectives and improve performance.

In a presentation on 'New Challenges for Society', **Björn Saltvik** of G-Partner, examined how new systems of learning, raising awareness and reporting might make a difference to fundamental security-related problems, such as corruption. Mr Saltvik outlined his "web-based whistleblower protection programme", which provides a secure and effective means of combating corruption. It was, he said, "a simple way to make a difference".

> "…web-based whistleblower protection programme - a simple way to make difference"
>
> **Björn Saltvik,**
> G-Partner, Norway

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Brian O'Malley from Intuition demonstrated how e-learning has been used in the UK Ministry of Defence to communicate Information Security Awareness, across a suite of programmes including Basic IT Security, Computer Network Defence and Document Handling Security. These short, targeted programmes are delivered on the Defence Learning Portal (DLP) and are used as part of a multi-modal education strategy to ensure that MOD staff are well equipped to preserve the security of MOD information, and in some cases to counter Computer Network Attack (CNA). Brian demonstrated the potential for this approach to extend to mobile learning – delivering small chunks of learning, multi-formatted, with standard SCORM tracking – to confirm that learners have read and understood the message.

Conference sessions were chaired by **Dr Harold Elletson** and **Janis Folkmanis**.

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The 5ᵗʰ International Forum on Technology Assisted Learning and Training for Defence, Security and Emergency Services

MARK YOUR CALENDAR!

**December 2, 2009
Hotel InterContinental Berlin**

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