



Education and Culture DG

Lifelong Learning Programme

Leonardo da Vinci



Enhance it – Improvement of continuing professional development of specialists in laboratory medicine in EU

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The Czech Republic



The town of Zlin





Bata shop in the world



Tomas Bata University



Tomás Bata Hospital



The aim of the project

The aim of the project is to:

- ▶ Improve continuing professional development (CPD) of Specialists in Laboratory Medicine
- ▶ Create a toolkit for trainers
- ▶ Devise 4 exemplar CPD activities
- ▶ Create website www.enhanceit.eu (It includes toolkit, CPD activities and other information)



Partners

- ▶ School of Biomedical Science and Physiology, University of Wolverhampton, UK
- ▶ Tomas Bata Regional Hospital, Inc, Havlíčkovo nábřeží 600, Zlin, Czech Republic
- ▶ *Croatian Metrology Society , Zagreb, Croatia*
- ▶ Mater Dei Hospital, Msida Malta
- ▶ Horvath and Dubecz Consulting Ltd, Budapest, Hungary



The 5 chapters of the toolkit

- ▶ Identify core elements of good practice by the comparison of approaches to CPD used within partner organizations and countries
- ▶ Define European quality standards and criteria for accreditation and evaluation of local hospital CPD activities
- ▶ Develop a framework for inclusion of reflective practice in CPD activities
- ▶ Produce guidelines for European hospital laboratories on managing and organizing quality CPD opportunities for laboratory staff
- ▶ Devise exemplar hospital laboratory CPD activities for provision on a new European hospitals CPD providers Community of Practice network



CPD activities

- ▶ **UK, Czech Republic, Croatia and Malta teams created 4 CPD activities**
- ▶ **These activities were performed at all partner institutions**



UK CPD activity

Health and Safety CPD Activity



UK CPD activity

Health and Safety CPD Activity



UK CPD activity

Health and Safety CPD Activity



Croatia – ISO 15189 CPD activity

- ▶ *The Head of Department (HD) is responsible for convening management reviews with, at a minimum, the Deputy Head, Chief Technician and Quality Manager. Management review is conducted every 12 months. HD has a right to shorten this interval if he/she assesses that it is necessary. Longer periods are not allowed.*
 - ▶
 - ▶ *QM is responsible for collecting and reporting information from the results of evaluation of:*
 - ▶
 - ▶ *internal audits;*
 - ▶ *risk management;*
 - ▶ *use of quality indicators ;*
 - ▶ *results of participation in PT/EQA programmes;*
 - ▶ *monitoring and resolution of complaints;*
 - ▶ *identification and control of nonconformities;*
 - ▶ *results of continual improvement including current status of corrective actions and preventive actions;*
 - ▶ *follow-up actions from previous management reviews;*
 - ▶ *changes in the volume and scope of work, personnel, and premises that could affect the quality management system;*
 - ▶ *other factors*
 - ▶
 - ▶ *Management team shall analyse the input information and assess opportunities for improvement of the quality management system and revision of quality objectives, policies and procedures.*
 - ▶
 - ▶ *QM is responsible:*
 - ▶ *to record findings and actions arising from management review*
 - ▶ *to report those information to laboratory staff*
 - ▶ *to ensure that actions arising from management review are completed within a defined timeframe.*
-



Czech Republic CPD activity

Preanalytical phase

Is it recommended to drink water in the morning before blood sampling?



- A. Yes, Drinking water is recommended before sampling.
- B. Only tea with sugar is recommended
- C. Only eating is recommended before blood sampling.



Czech Republic CPD activity

Preanalytical phase

Is this a suitable sample for blood count and potassium testing (The tube is with additive of K3EDTA)?

- A. Blood-additive ratio is not important. Potassium can be tested.
- B. This tube has proper draw volume. Potassium can be tested.
- C. This tube is overfilled. Potassium and blood count cannot be tested.



Czech Republic CPD activity

Preanalytical phase

Is it allowed to take antihypertensive drugs before blood count testing?

- A. Yes. antihypertensive drugs are allowed before sampling.
- B. Antihypertensive drugs can affect erythrocyte count
- C. Antihypertensive drugs can affect leukocyte count.



Malta CPD activity

Journal based learning

- ▶ Peter J. Howanitz, (2005) Errors in Laboratory Medicine: Practical Lessons to Improve Patient Safety. *Archives of Pathology & Laboratory Medicine*: October 2005, Vol. 129, No. 10, pp. 1252-1261.
- ▶ Friedecký B. Kvalita v klinické laboratoři a bezpečnost pacientů. *Klin. Biochem. Metab.*, 18 (39), 2010, No. 2, p. 136–143.



<ul style="list-style-type: none">• What do you understand by the term 'Total Testing Process'?
<ul style="list-style-type: none">• Give two concrete examples of possible errors for each stage of the testing process.
<ul style="list-style-type: none">• 'Performance measures help health care providers improve patient safety'. Which standards should be used when selecting performance measures?
<ul style="list-style-type: none">• List 5 examples of Critical Performance Measures.
<ul style="list-style-type: none">• (i) Who would you consider to be your customer? (ii) Which attributes of your service do your customers consider as most important?
<ul style="list-style-type: none">• (i) Define TAT (ii) From experience, mention 2 ways that can improve the TAT of most laboratory tests.
<ul style="list-style-type: none">• What are the implications of a wrong patient identification?
<ul style="list-style-type: none">• (i) What are the most frequent causes for failure in proficiency testing mentioned in the paper? (ii) From experience, mention 2 examples how improvement can be achieved.
<ul style="list-style-type: none">• 'Better No result than a Wrong result'. Give examples of specimen-related non-conformities that may affect a lab test result.
<ul style="list-style-type: none">• (i) What are critical values? (ii) Mention 2 problems which are often encountered when reporting critical values. (iii) How can reporting of critical values be improved?
<ul style="list-style-type: none">• Shortage of blood & blood products is a common occurrence in most hospital blood banks. It is therefore important to ensure that blood is utilized in the most efficient way. What practical methods can be adopted to reduce errors?
<ul style="list-style-type: none">• Blood Culture contamination can pose a clinical problem. Make a list of the specimen collection variables that helped in reducing contamination errors in the study.



OUTCOMES of the project

- ▶ 4 CPD activities
- ▶ Toolkit for trainers
- ▶ Web site: www.enhanceit.eu
- ▶ Everything is in English, Czech, Croatian and Hungarian language

▶ Journal publications:

Martin J., Gasljevic V., Šálek T., Horvath A., Borg C., Flegar Mestric Z., Jakovcic, M., Šilhavík J., Adonics A., Szlamka Z., Brincat I., Buttigieg, D., Ciantar, N., Sciortino A., Mifsud A., Adkins A., Bennett, T., Rice, K., Taylor, Y. Comparison of Approaches and Measurement of Continuing Professional Development for Specialists in Laboratory Medicine within Four European Countries. [Accepted for publication in *Clinical Chemistry and Laboratory Medicine*; 09 June 2014]

Martin, Jan, Dorianne Buttigieg, Josef Šilhavík, Zlata Meštrić Flegar, Alison Adkins, Visnja Gasljevic, Tomáš Šálek, et al. 2014. Enhance It - Enhancing Hospital Laboratory Standards for Continuing Professional Development: Transnational Evaluation of a Novel CPD Activity for Biomedical Scientists. *American Journal of Educational Research* 2014 (11): 1110–14.
Viděno prosinec 1



Conclusions

- ▶ We have seen similarities and differences among countries
- ▶ Education is key in the information century
- ▶ The patient is always the centre of attention
- ▶ It is ideal if medical doctors in the field of laboratory medicine work also clinically



Thank you for your attention

