Technical Secretariat



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NOTE BY THE DIRECTOR-GENERAL

EVALUATION OF THE RESULTS OF THE TWENTY-FIRST OFFICIAL OPCW PROFICIENCY TEST

- 1. The Director-General wishes to inform the Member States of the results of the Twenty-First Official OPCW Proficiency Test, which was conducted by the Technical Secretariat (hereinafter "the Secretariat") from 20 April 2007 to 20 July 2007. The test was conducted in accordance with the following set of quality documents:
 - (a) "Standard Operating Procedure for the Organisation of OPCW Proficiency Tests", QDOC/LAB/SOP/PT1, dated 15 September 2006;
 - (b) "Work Instruction for the Preparation of Test Samples for OPCW Proficiency Tests", QDOC/LAB/WI/PT2, dated 2 April 2007; and
 - (c) "Work Instruction for the Evaluation of Results of OPCW Proficiency Tests", QDOC/LAB/WI/PT3, dated 2 April 2007.
- 2. Designated laboratories must, in order to retain their designation, demonstrate once per calendar year that they have maintained their capabilities in a proficiency test organised by the Secretariat. Laboratories may either participate in these tests as regular participants, or support the Secretariat in the preparation of the test samples or in the evaluation of the test results.
- 3. Two laboratories assisted the Secretariat to conduct this test: the Laboratory of Analytical Chemistry, Research Institute of Chemical Defence, China, which prepared the test samples, and Edgewood Chemical and Biological Forensic Analytical Center, Edgewood, United States of America, which evaluated the test results.
- 4. The preliminary evaluation report was discussed at a meeting between Secretariat staff and the test participants on 20 July 2007. The participants were given two weeks to comment on the results, and to inform the Secretariat whether they accepted the performance evaluation.
- 5. Laboratories 3, 5, 6, 7, 8, 11, and 13 submitted comments, and based upon these, Edgewood Chemical and Biological Forensic Analytical Center, Edgewood, United States of America, re-evaluated the preliminary results. The Secretariat agreed with

the results of the re-evaluation, which led to a change in the preliminary scores for Laboratories 4, 6, 7, 8, and 11. The evaluating laboratory submitted its final evaluation report to the Secretariat on 10 August 2007.

- 6. The principal results of the Twenty-First Official OPCW Proficiency Test can be summarised as follows:
 - (a) Twenty laboratories from 16 Member States were nominated to participate in this proficiency test, including the two assisting laboratories.
 - (b) One nominated laboratory withdrew from the test before the sample dispatch date, which was accepted by the OPCW Laboratory without any penalties (see paragraph 10 of QDOC/LAB/SOP/PT1).
 - (c) Sixteen laboratories met the adopted criteria for submission, timeliness, and reporting.
 - (d) Of the 16 laboratories that submitted a report, 12 laboratories were scored in the test.
 - (e) One laboratory failed to submit an analysis report, and consequently failed the test.
 - (f) One laboratory reported one irrelevant chemical, and thus failed the test.
 - (g) Three laboratories reported chemicals that were categorised as false positive chemicals, and consequently failed the test.
 - (h) Five laboratories identified all of the deliberately introduced (spiking) chemicals used for scoring, and reported them with sufficient analytical data.
 - (i) The laboratories that assisted the Secretariat in preparing the test samples and in evaluating the results were awarded the maximum performance rating of A.
- 7. The final results for all the nineteen participating laboratories are presented in the table annexed hereto.
- 8. The participating laboratories are reminded that, if they have made any errors or reported false positives or false negatives (arising from a failure to find a spiking chemical or to provide sufficient supporting data for a chemical that is found), they should take immediate remedial action. Before participating in the next test, each such laboratory is required to submit to the Secretariat a full report stating the cause of the problem and **any remedial action it has taken**. Any such laboratory failing to submit the required report, including details of the remedial action it has taken, will not be permitted to participate in the next proficiency test.

Annex:

Final Results of the Twenty-First Official OPCW Proficiency Test

Annex

FINAL RESULTS OF THE TWENTY-FIRST OFFICIAL OPCW PROFICIENCY TEST

Participant (Identification Code)	No. of Scorable Reported Chemicals	No. of Chemicals Scored	Rating	Comments ¹
China Laboratory of Analytical Chemistry, Research Institute of Chemical Defence, Beijing	-	-	A	Preparation of samples
China (8) Laboratory of Toxicant Analysis Academy of Military Medical Sciences Institute of Pharmacology & Toxicology, Beijing	7	7	Α	-
Denmark (7) Ministry of Defence, Emergency Management Agency, Chemical Division Copenhagen	5	2	D	Spiking chemicals A and E not reported. Insufficient data for spiking chemicals C, F, and G.
Germany (17) Bundeswehr Research Institute for Protective Technologies and NBC Protection, Munster	6	6	В	Spiking chemical E not reported

The spiking chemicals were as follows:

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- **O**: **(A)** 2-Chlorovinyldichloroarsine;
 - (**B**) Bis(2-chlorovinyl)chloroarsine;
 - (C) Bis(2,4,4-trimethylpentyl) methylphosphonate;
- W1: (D) Methylphsophonic acid;
- W2: (E) 2-(N,N-Diisopropylamino)ethanesulfonic acid;
 - (F) 2-(N-Ethyl-N-isopropylamino)ethanol;
 - (G) Bis(2-diisopropylaminoethyl) disulfide

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Participant (Identification Code)	No. of Scorable Reported Chemicals	No. of Chemicals Scored	Rating	Comments ¹
Hungary (10) Hungarian Defence Forces Military Medical Center-Scientific Institute Budapest	5	3	D	Spiking chemicals B and E not reported. Insufficient data for spiking chemicals A and G
India (5) Defence Research & Development Establishment VERTOX Laboratory Gwalior	7	7	A	-
India (11) Centre for Analysis of Chemical Toxins Analytical Chemistry Division Indian Institute of Chemical Technology, Hyderabad	7	7	A	-
Indonesia (14) Research Centre for Chemistry-Indonesian Institute of Sciences Komplek Puspiptek, Banten, Indonesia	3	0	D	Spiking chemicals A, B, D, and E not reported. Insufficient data for spiking chemicals C, F, and G
Indonesia (16) Pusat Laboratorium Forensic Polri (Puslabfor Polri) Jakarta, Selatan	-	-	F	No report submitted
Korea (4) Chemical Analysis Laboratory CB Department, Agency for Defence Development, Taejon	4	4	С	Spiking chemicals A, B, and F not reported

Participant (Identification Code)	No. of Scorable Reported Chemicals	No. of Chemicals Scored	Rating	Comments ¹
Malaysia (12) Department of Chemistry Malaysia Ministry of Science, Technology and Innovation Petaling Jaya	3	3	D	Spiking chemicals A,B,E, and G not reported
Romania (9) NBC & Ecological Defence Scientific Research Centre-Chemical and Testing Laboratory, Bucharest	4	-	F	Spiking chemicals A, B, and E not reported. Insufficient data for spiking chemical C. False positive reported.
The Russian Federation (13) Central Chemical Weapons Destruction Analytical Laboratory of the Federal National Unitary Establishment State Research Institute of Organic Chemistry and Technology, Moscow	5	-	F	Spiking chemicals B and E not reported. False positive reported
Singapore (1) Verification Laboratory DSO National Laboratories	7	7	Α	-
Spain (6) Fábrica Nacional "La Marañosa", Carretera San Martin de la Vega, Madrid	6	5	С	Spiking chemical E not reported. Insufficient analytical data to support spiking chemical D
Switzerland (3) Spiez Laboratory Swiss NBC Defence Establishment Analytical Chemistry Branch Spiez	7	7	A	-

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Participant (Identification Code)	No. of Scorable Reported Chemicals	No. of Chemicals Scored	Rating	Comments ¹
Turkey (15) The Scientific and Technological Research Council of Turkey Bursa Test and Analysis Laboratory TUBITAK, Bursa	-	-	F	Three false positive chemicals reported
Turkey (2) Refik Saydam Central Hygiene Institute Poison Research Department Mudurlugu, Ankara	-	-	F	Spiking chemicals not reported. Irrelevant chemical N reported
United States of America Edgewood Chemical and Biological Forensic Analytical Center, Edgewood	-	-	A	Evaluation of results

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