

EUROPEAN DNA PROFILING GROUP (EDNAP) MEETING

Brussels, Belgium

31 October 2012

Hosts: Fabrice Noel and Tom Heylen

Chairman: Niels Morling.

A list of participants is attached.

Welcome

Director Jan De Kinder, INCC, welcomed members to Brussels.

Update on exercises

mRNA exercise no 3

Cordula Haas

The manuscript of mRNA exercise 3 and 3a were recently accepted for publication in FSI: Genetics (see attached presentation).

mRNA exercises no 5

Cordula Haas

Cordula Haas presented the results obtained in the laboratories *mRNA exercise no 5* on vaginal secretion markers (presentation attached). Briefly, results have at this moment been received from 22 laboratories on 7 mRNAs of 8 mock casework samples and dilutions of samples with vaginal secretion. The EDNAP members accepted an offer from Cordula Haas to write a draft of a manuscript on the results of mRNA exercises 4 and 5.

It was agreed that Cordula Haas will explore the possibility of identifying epithelial cells by means of mRNA investigations and, hopefully, present a plan at the next EDNAP meeting for a collaborative exercise.

The IrisPlex exercise on genetic prediction of eye colour

Manfred Kayser

Manfred Kayser presented the plan for the collaborative EDNAP exercise for the prediction of eye colour with the IrisPlex (presentation attached). The details are found in the attached presentation of the exercise. Briefly, the exercise will include SNP typing with a 6-SNP-plex, PCR multiplex amplification, 6-plex SBE extension with SNaPshot, capillary electrophoresis and detection with multicolour fluorescence. During the first two weeks of November 2012, Rotterdam will send out samples, critical reagents, protocols, information and a spread-sheet for interpretation of results. The results should be returned to Rotterdam before the end of January 2013.

Updates from other groups

EMPOP

Walther Parson

Walther Parson gave an update on EMPOP (presentation attached). Walther Parson gave an update on the developments in EMPOP. Since the last meeting collaborative studies were published including announcements of population data from Somalia and Iraq, an opinion letter on the effects of changing mtDNA reference sequences and a paper challenge on mtDNA interpretation by the GHEP-ISFG group. The international meeting "DNA in Forensics 2012" took place 8-10 September 2012 in Innsbruck, Austria. The meeting was

attended by more than 250 colleagues from 50 countries. mtDNA training took place 8-10 October 2012 at the NFI. New developments include an improved editor for drawing quasi-median networks for QC purposes. EMPOP Release 8 was issued including 26,073 haplotypes (presentation attached).

ISFG Commission on drop-in and drop-out, etc.

Peter Gill

The ISFG recommendations are now published (Gill et al. Forensic Sci Int Genet 2012; 6: 679-88). Peter Gill gave a brief summary of the recommendations (presentation attached).

NIST

Niels Morling

Niels Morling briefly presentation the information supplied as a pdf by John Butler on the work at NIST based (presentation attached).

EuroforGen - NoE

Peter Schneider

Peter Schneider gave an update on the EUROFORGEN Network of Excellence project that started 1 January 2012 (presentation attached).

ENFSI DNA Working Group

Ingo Bastisch

Ingo Bastisch reported on the activities and considerations concerning the future of the ENFSI DNA Working Group (presentation attached). One point is that the steering group suggests only one meeting per year in the future.

Other activities

LRmix

Peter Gill

Peter Gill presented the facilities in the open source software LRmix for the interpretation of complex STR results in a crime case with complex results (presentation attached).

Canine mitochondrial genome sequencing to improve the genetic profiling of dog hair

Sophie Verscheure, INCC

Sophie Verscheure presented results of investigations of mtDNA in hairs from dogs (presentation attached).

Contamination with DNA

Peter Gill

Peter Gill presented the report of the Forensic Science Regulator in England/Wales on a contamination problem in one of the English laboratories (<http://www.homeoffice.gov.uk/publications/agencies-public-bodies/fsr/dna-contam-report>) (presentation attached). The members discussed the most important issues.

EDNAP web site update (www.isfg.org/EDNAP)

Peter Schneider

Members are encouraged to visit the website.

Future activities

Niels Morling

It was decided to continue to meet twice a year – among others in order to facilitate the exercises, which the members find important. If ENFSI decides to reduce the number of meetings to one per year, one of the two yearly EDNAP meetings can, hopefully, be held in conjunction with the ENFSI meeting, and the other of the two yearly EDNAP meeting can be arranged by EDNAP – hopefully in conjunction with the meeting of the ENFSI steering group. Although it is expected that EDNAP and EuroforGen will have a fruitful collaboration, it is still to be decided how the collaboration should work in the future.

Any other business

There was no other business.

Next EDNAP meeting

The next EDNAP meeting will be organised 23 April 2013 in conjunction with the meeting of the ENFSI DNA Working Group at the Crowne Plaza Bratislava Hotel in Bratislava, The Slovak Republic. There will also be a CODIS meeting 23 April 2013. The ENFSI group will meet 24 and 25 April 2013. The meetings are organized by Livia Zatkalikova and colleagues.

Closing of the meeting

The meeting closed with sincere thanks to Fabrice Noel, Tom Heylen and their colleagues at the laboratory in Brussels.

Attachments

- List of participants
- Presentations by
 - Cordula Haas: mRNA exercises no 5
 - Manfred Kayser: Planned IrisPlex exercise
 - Walther Parson: EMPOP report
 - John Butler: NIST report
 - Peter Gill: ISFG recommendations – summary
 - Peter Schneider: EUROFORGEN-NoE report
 - Ingo Bastisch: ENFSI report
 - Peter Gill: LRmix – example
 - Sophie Vershure: mtDNA in hairs of dogs
 - Peter Gill: DNA contamination – the report of the Forensic Science Regulator.