Bennett Commission of Inquiry – Notice 1.001
Queensland Health – Preliminary Response to Items 6 and 7

6(a) Lists or other such documents, including but not limited to such documents prepared for or provided to the interim advisory board for Forensic Science Queensland, identifying:

a) the number of tested DNA samples (i) affected, or (ii) compromised by the use of the MultiPROBE® II PLUS HT EX with Gripper™ Integration Platform in any automated method of extracting DNA for analysis as part of the DNA IQ system used by Queensland Health Forensic and Scientific Services between 29 October 2007 and 21 November 2016;

1. The Commission has requested lists of the number of tested DNA samples affected or compromised by the use of the MultiPROBE® II Platform.

2. We do not currently have this list, and a list of this nature may not be easily created. On one view, the terms "affected" or "compromised" might refer to samples where DNA extracted did not yield a sufficient quantitation value, for example, of greater than 0.001 ng/µL. However, a low yield value might also represent the amount of DNA which was present on the sample in the first place, and so not attributable to any compromise owing to use of the MultiPROBE® II Platform.

3. Using standard AUSLAB user functionality, we have identified that 121,753 casework samples (from 1,587 batches) and 9,570 reference samples (from 232 batches) were added to the automated extraction batch types processed by the MultiPROBE® II Platform between 29 October 2007 and 21 November 2016. We do not, at this stage, know how many individual cases this number is drawn from. These figures include:

    - crime scene (casework) and persons of interest (reference) samples that may have been extracted multiple times
    - routine positive and negative control samples included on every batch
    - other positive and negative controls tested in the laboratory
    - environmental monitoring samples
    - possible duplicates due to aborted batch returns

4. If the controls and environmental monitoring samples were excluded, the number of casework samples may be significantly reduced.

5. Producing the lists required by the Commission would require some clarifications about how the terms "affected" or "compromised" are to be interpreted, and about whether the controls and environmental monitoring samples are required. Further, we note the following:

    - The Forensic Register was implemented in 2017 and so the data for the samples the Commission is concerned with are stored within the AUSLAB system. AUSLAB can be accessed by scientists or users within Queensland Health.

    - To access specific data, FSQ is required to submit a data request via the Queensland Health Clinical Information Systems Support Unit (CISSU).

6. Notwithstanding, we have taken the following steps towards producing the list required by the Commission:

    - On 23 October 2023 we enquired about and received a Data Request Form from CISSU

    - On 24 October 2023 we requested information from CISSU about what the turnaround time would be to receive requested data

    - On 27 October 2023 we were advised that a simple data request, that can be performed through extended enquiries, will only take a few business days, while a complex request could take months. After further discussions with CISSU on this date, they advised the

required data is likely to only be obtainable through a request to the AUSLAB vendor. An accurate timeframe for the request cannot be provided until FSQ submits the request and it is assessed by CISSU and the AUSLAB vendor.

- On 27 October 2023 we requested the data for casework samples and reference samples processed by the MultiPROBE® II Platform between 29 October 2007 and 21 November 2016 from CISSU.

7. Any data provided by CISSU will require manual checking to confirm the accuracy of the dataset to be provided to the Commission. Once the data has been received, we estimate that the manual checking process may take between three and four days.

6(b) Which tested DNA samples identified at 5(a) (sic) above have been (i) retained by Queensland Health Forensic and Scientific Services or any successor and (ii) are capable of yielding sufficient DNA to be retested?

8. In response to (i), all DNA extracts have been retained. However, there may be some samples where no extract is left due to further testing performed. To find out which of the samples have sufficient sample volume for testing will either require a data query to CISSU to find out how many tests per sample have been performed or will require a sample-by-sample review. A sample-by-sample review is a manual process and for that reason it is difficult to say with certainty how long a sample-by-sample review would take.

9. In response to (ii), if the initial DNA results are not being relied upon, we cannot presently say which samples are capable of yielding sufficient DNA to be retested without further testing. That is, we would need to determine which samples have sufficient volume for testing, before determining which samples are capable of yielding sufficient DNA to be retested. Collation of this data would likely require a sample-by-sample approach.

6(c) Persons able to speak to the DNA extraction process undertaken, including in respect of each tested DNA sample.

The following people would be best placed to speak to the DNA extraction process undertaken:

- Natasha Mitchell is the Laboratory Manager (Biology).
- Luke Ryan is the Analytical Team Leader who could speak to the extraction and analysis process.
- Emma Caunt is the current Acting Deputy Manager for case management who could speak to profile interpretation.

7(a) Lists or other such documents, including but not limited to such documents prepared for or provided to the interim advisory board for Forensic Science Queensland, identifying:

a) the number of tested DNA samples identified at 6(a) above for which the source material from which they were extracted has been retained by or is accessible to Queensland Health Forensic and Scientific Services or any successor entity;

10. We understand this request to relate to samples which have had the original substrate/material, that the DNA was extracted from, retained. In that case, except for the substrate types listed in paragraph 12, all other sample substrate types, including swabs, have been routinely retained.

11. Some samples with routinely retained substrates may have had their substrate discarded in error. The substrate is the material left over from the extraction process. Retention is dependent on the original sample type and is also impacted by whether the sample is fully consumed during the DNA

extraction process. Comprehensive datamining is required to determine which samples have remaining substrates.

12. From 31 May 2010 the following substrates were discarded up until a 'no destruction' notice was issued prior to the 2022 Commission of Inquiry:

    a. Chewing gum
    b. cigarette butts
    c. fingernails
    d. toothbrushes
    e. straws
    f. extraction positive controls
    g. CTS samples
    h. Stamps
    i. Envelopes
    j. environmental samples in-house and QPS.

13. The number of samples for each sample type, including whether the original substrate/material is still available, is not readily accessible in AUSLAB. A breakdown of these sample types may be possible by making a data request via CISSU. CISSU have confirmed that any such request will be expedited and have estimated this will take between two and three business days to provide.

7(b) The number of source material items identified at 6(a) above that are capable of yielding sufficient DNA to be tested;

14. If the sample substrate or exhibit has been retained, it is not presently possible to advise which of these is capable of yielding sufficient DNA for retesting until they are re-tested. That is, we will need to determine which sources have been retained, before determining which sources are capable of yielding sufficient DNA to be retested. Collation of this data would likely require a sample-by-sample approach.

7(c) Persons able to speak to the matters identified at 7(a) and 7(b) above.

The following people would be best placed to speak to matters about the retention of source materials and whether items are capable of yielding sufficient DNA to be tested:

- Natasha Mitchell is the Laboratory Manager (Biology).
- Luke Ryan is the Analytical Team Leader who could speak to the extraction and analysis process.
- Emma Caunt is the current Acting Deputy Manager for case management who could speak to profile interpretation.

Conclusion

Queensland Health desires to cooperate with and assist the Commission. However, the lists required do not presently exist, and the creation of such lists has not been possible in the time available to prepare this response. Queensland Health is willing to meet with the Commission's staff to provide further explanation if required, or to explain what data could readily be produced in a short amount of time.