



Faculty of Forensic & Legal Medicine

Recommendations for collecting nail clippings for toxicology

Jun 2017 Review date Jun 2020 – check www.fflm.ac.uk for latest update

The medico-legal guidelines and recommendations published by the Faculty are for general information only. Appropriate specific advice should be sought from your medical defence organisation or professional association. The Faculty has one or more senior representatives of the MDOs on its Board, but for the avoidance of doubt, endorsement of the medico-legal guidelines or recommendations published by the Faculty has not been sought from any of the medical defence organisations.

General information

1. Fingernail (or toenail) clippings can be used for drugs analysis, especially as an alternative when the individual has no, or a limited amount of, head and body hair.
2. Nail clippings should only be taken a minimum of 4 weeks after date of interest.
3. A single dose of a drug may not be detected in a nail sample.
4. With a positive result, it is not possible to relate the results from fingernails/toenails to the dose of drug ingested as the amount of a drug incorporated into nails varies greatly between individuals and is also incorporated into the nail over the whole nail bed.
5. It is not possible to relate a positive result to a particular date or time period. Drugs may be detected in nails within about 1 to 4 weeks after use/ingestion but will then generally remain detectable in the nail for several months (longer in toenails than in fingernails).
6. Drugs can be incorporated into nails via direct environmental exposure to illicit drugs (e.g. from handling illicit drug packages, drug dealing etc)

Storage

Nail clippings for toxicology must not be frozen or refrigerated. They must be stored dry at normal room temperature.

Method of sampling and packaging

1. Nails should be clean and free from dirt (wash hands and nails as normal) and nail polish (removed with nail polish remover).
2. The nail clippers or scissors used for collection should be cleaned prior to use (preferably using a non-alcohol containing cleaning wipe).
3. Clip/cut (or ask the individual to clip/cut) the nails as close to the nail bed as comfortable over a clean sheet of paper to collect the clippings. Ideally, collect at least 2 – 3mm of clippings from each of the 10 digits which should provide about 100mg of nail clippings from an adult (the preferable amount for analysis), although a more limited analysis is possible on smaller samples.
4. Either transfer the clippings into an appropriate specimen collection kit container e.g. Sterilin™ vial (as in the nail collection kit) or, if not available, fold the paper over on each side to securely enclose the clippings, secure with tape/seal to keep paper closed, etc. and place into a tamper-evident bag and seal.