

Purpose

This procedure describes:

- > the assessment of employees' training requirements needs to assure satisfactory performance
- the provision of specific training and general quality awareness training
- > the maintenance of Training Records

Scope / Field of Application

This procedure applies to all employees.

Definitions and Acronyms

Competency testing – test to evaluate theoretical knowledge and practical skills needed to perform their specific job function.

Proficiency testing – test to evaluate the continuing capability to perform their specific job function.

Skills – ability to apply knowledge effectively and readily in performance.

Training – a process to provide and control competence to meet requirements.

Assessment tool – Documentation, usually in measurable form, of the knowledge, skills and abilities to perform assigned duties. Quantitatively measured by PEP.

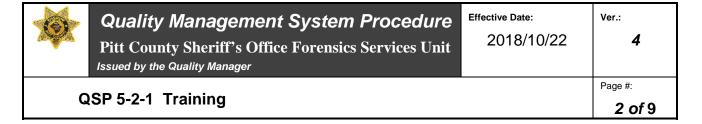
Key support personnel – Those employees who contribute to the processing of casework in a substantive, measurable way, including evidence technicians, etc.

Managerial personnel – Those employees who administer and oversee Analyst, technicians and other support personnel.

Training checklist –The documentation prepared by the training coordinator that reflects the steps necessary for completion of an employee's training, dates of completion and the signatures/initials of the training coordinator.

Responsibilities

Technical Leaders are responsible for assuring that the employees assigned to them are trained or otherwise qualified for the assigned jobs. Before assigning an employee for the first time to a new job, Technical Leader shall check their training to verify that the employee has been trained or qualified for the new job.



Technical Leaders ensure that records of these assessments and subsequent training are maintained along with any supporting documentation (certificates, diplomas etc.).

All Employees shall:

- > bring to the attention of the manager their needs for specific or general training
- > attend and participate in training sessions provided, whether in-house or external

Management shall:

- redentials, which meet the requirements specified by job descriptions
- > provide formal training for personnel and organization as requested

Quality Manager/Technical Leader shall:

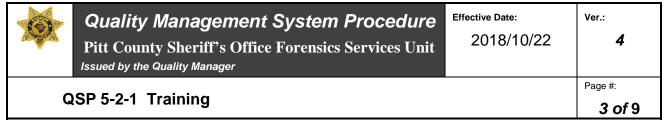
- identify and document the required education, experience, and professional credentials for each position that reports to them
- > ensure that employees receive training in the quality management system
- identify continuing training requirements such as additional formal training, on-the-job training (OJT), and certification
- develop training plans that address any gaps between current and required knowledge, skills, and competencies needed to perform assigned tasks
- ensure training specified in the individual development plan section of the employee performance appraisal is completed
- retain records of required training and completed training
- ensure only qualified personnel perform work affecting quality or ensure that tasks performed by employees who have not yet received appropriate training are reviewed by an appropriately qualified individual
- ➤ The Technical Leader shall be responsible for the establishment and maintenance of a formalized technical training program. Each program shall be described in training procedures specific to each discipline and utilize a training checklist.

Materials Required

LOG # 5-2-1-L2, Checklist for Friction Ridge Training

LOG # 5-1-1-L3, Checklist for Drug Training

LOG # 5-1-1-L4, Checklist for BAC Training



Procedure

The Lab Director, Quality Manager/Technical Leader uses the job description to identify and document education, experience, and professional credentials of each position. The Lab Director, Quality Manager/Technical Leader shall prepare job descriptions when a new position is established or duties of the position change.

The Training Review is an informal discussion between the Lab Director/Technical Leader and each employee in which the employee's job description, current skills and knowledge and current/future responsibilities are compared in order to identify areas where additional training is necessary or beneficial.

Introductory Training

Upon date of hire, the Lab Director Quality Manager/Technical Leader introduces the new employee to a general set of training requirements that must be completed prior to any further activities in the laboratory. This training includes:

- an overview of the Laboratory's history and its philosophy
- > a walk-through of the facility
- a review of the safety and chemical hygiene plan and a safety equipment walk-through/usage review
- begin discipline specific training program

QA/QC Training

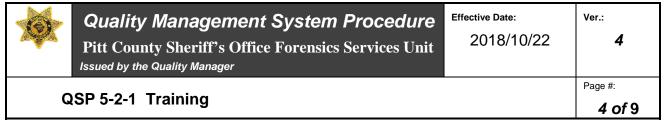
Prior to training in a specific discipline, it is essential that the employee has a thorough understanding of the general quality assurance/quality control principles and objectives that are the underlying foundation of all work performed. Accordingly, a detailed review of the quality management system is performed with the Quality Manager.

General Forensic Science Training

Training shall include general knowledge of forensic science. This training can be provided through basic law enforcement training, forensic academy training, or to the extent necessary training with the Technical Leader of the appropriate discipline(s) to review the evidence handling procedure as based on their approved training program.

Discipline Specific Operational Procedures and Methodology

Personnel responsible for the opinions and interpretations included in test reports must have relevant knowledge of the technology used for the identification of the items, materials, products tested, or the way they are used or intended to be used and of the defects or degradation that may occur during



or in service knowledge of the general requirements expressed in the legislation and standards. Training in the test methods and procedure used to determine reportable results shall be performed.

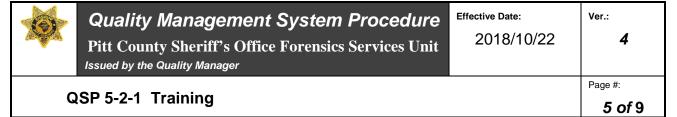
Training Assessment

The means by which a trainee understands of the subject matter is assessed by competency exams. The assessment format may vary from each discipline, but shall be addressed in the training procedures and contain the following three elements:

- ➤ Practical Exam (final) Known item provided to the trainee to work as a real case, but without assistance or consultation. The case shall simulate an average case of test items in difficulty and complexity. The trainee shall not know the expected outcome of the case. For successful completion, the trainee shall obtain the expected conclusion and generate documented result. Final practical exam used for Moot Court testimony shall be completed at 100% accuracy.
- ➤ Practical Exam's (discipline specific)—individual discipline procedures exams shall be completed according to that disciplines training procedure.
- ➤ Competency test The written test shall test the trainee's technical knowledge. The trainee shall clearly demonstrate sufficient technical knowledge to perform all examinations unaided and to draw accurate conclusions from those examinations. A minimum score of 85% is required for successful completion of written tests. All written assessments shall have an answer key.
- Moot Court The moot court is a formal simulated court experience at which the trainee shall play the part of an expert witness to testify to all aspects of the final practical exam. The Lab Director or Quality Manager shall be in attendance. The trainee shall demonstrate the ability to present and explain the practical exam results on the stand.

The trainee's performance at the mock trial shall be documented. After the mock trial, the trainee shall be provided constructive feedback on his/her performance; the trainee shall review this and be presented with a copy.

After the Quality Manager has reviewed this, it shall be retained in the training file. If the trainee's performance is unsatisfactory, the management team member responsible for the employee's training shall determine whether additional training is necessary for the employee. If additional training is recommended, the trainee shall complete that required training.



Once an Analyst has been released for independent casework in a discipline, qualification for any subsequent discipline or sub discipline may be satisfied by a roundtable discussion, question and answer period, or moot court.

Training Assessment for Experienced Scientist

If the Laboratory hires an individual who has previous training and or experience, Section Training Procedures shall provide for the assessment and/or documentation of the employee's knowledge, skills and abilities. The employee's training may be expedited; however, the Section shall ensure that the employee possesses the same body of knowledge as an employee who has completed the entire training process.

The employee's orientation and familiarization with the laboratories quality management system has to be documented and the employee has to be released by the QM prior to participating in any testing of case items. An attempt shall be made to obtain any written training documents from the employee's previous employer. Any training documents shall be included in the employee's training file.

A training plan based upon the trainee's education and experience shall be developed and implemented by the Technical Leader. The Technical Leader shall ensure that appropriate testing is documented in the employee's training file. The quantity and type of testing shall be determined by Technical Leader upon review of the employee's qualifications, time since working last case work and documentation of any prior formal performance evaluation program results.

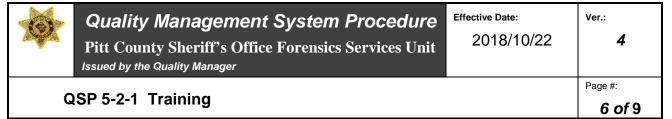
In order for completion of training, the employee's shall demonstrate practical competency in the testing procedures to the satisfaction of the Technical Leader, Quality Manager and Lab Director. Around table discussion and /or moot court covering all aspects of the discipline shall be conducted.

Upon successful completion of all aspects of training, the Analyst shall be released for independent work.

Official Release

Upon an employee's successful completion of training in a specific procedure, the Technical Leader shall forward the employee's complete training document and a memo recommending release for casework to the Quality Manager for review.

The Quality Manager shall assess the training documents and, if it is complete, initial the memo releasing the employee to use the procedure in casework.



Upon completion of discipline specific full training program for independent casework, the Technical Leader shall present all training documents and a memo to the Quality Manager for review. The Quality Manager shall review the documents and if they are complete, shall initial the memo and forward the documents to the Lab Director for review.

The Lab Director shall review the employee's training documents. If satisfied as to the competency of the employee, the Lab Director shall initial the memo releasing the employee for independent case work.

The Quality Manager shall ensure that copies of the memo are distributed to the employee and the training file of the employee.

The Quality Manager or designee shall maintain a Work Authorization List detailing the approved type of analysis/work and equipment/instrumentation. The Technical Leader shall approve this Work Authorization List.

The employee shall meet with the Quality Manager to evaluate the training program. This meeting shall take place within three months of the release to do casework. The Quality Manager shall document this meeting and facilitate any necessary follow-up to this meeting.

Additional Training and Assessment

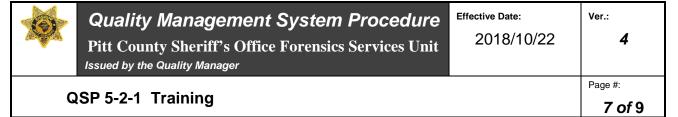
External proficiency tests shall be given annually in each discipline. One test per discipline shall be from an approved accredited external source provider and forwarded to accrediting body. Each year employees who perform the discipline/sub-discipline shall be given an internal or external Proficiency Test with each individual having to complete one external test during each accreditation cycle.

Analysts who perform forensic testing on casework in multiple sub-disciplines shall successfully complete at least one external proficiency test during each four year accredited cycle, in each category of testing appearing on the Laboratory's Scope of Accreditation, in which the analyst performs testing.

Employees shall be notified of changes in policies, procedures, methods and/or equipment or instruments and receive any necessary training.

Employees shall be retrained when their performance is unsatisfactory.

During retraining, the analyst shall not perform independent casework in the relevant discipline.



The steps for retraining shall be documented and signed by the Quality Manager/Technical Leader and analyst before the retraining begins. Documentation of retraining shall be completed by the Quality Manager or the assigned trainer.

Prior to resuming casework, the analyst shall successfully complete a competency and/or proficiency test which shall include the area(s) of deficiency.

Upon successful completion, documentation of retraining shall be reviewed and signed by the trainer and/or supervisor and Quality Manager indicating completion of all retraining and approval to resume casework. Documentation shall be stored in the training file.

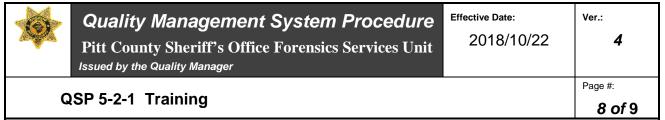
The Technical Leader is responsible for ensuring effective training. Upon completion of initial training, all analysts are required to prove competency by internal competency examinations prior to analyzing client test items/samples unsupervised.

All employees shall perform their jobs as instructed or as covered by standard operating procedures (SOP's). They are **NOT** allowed to change tasks covered by SOP's until the change is approved according to the Procedure for Authorizing Deviations

Documentation

Comprehensive training of all laboratory staff is vital to the continued development of the staff as well as the continued maintenance of the laboratory's quality program. All staff training will be conducted under the direction of the Quality Manager/Technical Leader. All activities relative to training will be thoroughly documented and maintained in each employee's personnel training file. Included in this file are copies of resumes, job descriptions, all in-house training records and all documents pertaining to external training (e.g. seminars, instrument manufacturer training courses, etc.).

Required Record	Custodian
Competency Testing	Supervisor/Quality Manager
Position Description	Supervisor/ Human Resources
Additional training records	Supervisor/Quality Manager
Proficiency Testing	Quality Manager

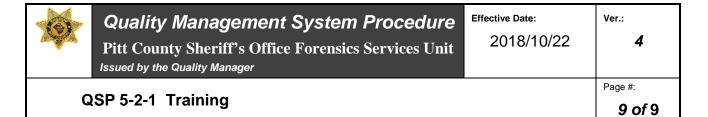


Reference Procedures

All technical procedures require training.

References

Garfield, F.M., Kleska, E., Hirsch, J. 2000. Quality Assurance Principles for Analytical Laboratories. 3rd Edition. AOAC. Gaithersburg, MD.



REVISION HISTORY		
CURRENT VERSION	EFFECTIVE DATE	SUMMARY OF CHANGES
1	2016/07/01	Original version
2	2018/04/01	Added statement to clarify schedule of proficiency testing both internal and external. Change issue date to effective date, changed rev# to ver# and changed revision history table. Change forensic scientists to Analysts
3	2018/04/25	Change /delete under <u>practical</u> the "new Test Item reference" to exclude the possibility of use of real case items in training.
4	2018/10/22	Added section on General Forensic Science training on page 3.