

## Review Article


# The Role, Composition, and Action Plan of Clinical Competency Committees in Forensic Learning

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## Abstract

Clinical Competency Committees (CCCs) are essential for ensuring the effective assessment and development of learners in forensic science education. This article explores the roles, members, and lines of action of CCCs in forensic learning, providing practical examples to illustrate their function. The analysis highlights how CCCs contribute to maintaining high educational standards and preparing students for professional practice in the forensic field. In the Indian scenario, Competency-Based Medical Education has been implemented since 2019 but Entrustable Professional Activities (EPA) and the Clinical Competency Committee have not yet been placed in the curriculum which hampers proper delivery of CBME and fails to match international standards of medical education.

## Key words

Clinical Competency Committee, Forensic, Learning, Role, Action plan, Composition.

## Introduction

The increasing complexity and interdisciplinary nature of forensic science necessitate rigorous and structured evaluation of students' competencies. Clinical Competency Committees

(CCCs) have emerged as a critical component in this evaluation process, providing comprehensive oversight of learner progress [1]. This article examines the roles, members, and action plans of CCCs in forensic learning, illustrating their

importance with relevant examples along with current status in Indian scenario.

### **Roles of Clinical Competency Committees in Forensic Learning**

CCCs are responsible for evaluating student performance [2], providing feedback [3], and making decisions regarding learners' progression and readiness for independent practice. Their roles can be broadly categorized into assessment [4], feedback, and decision-making. All three are vital components in competency based education.

#### **Assessment**

CCCs systematically review student performance across various competencies, ensuring that assessments are comprehensive and objective. Assessment method must be able to evaluate either student has achieved desirable competency or not [5].

*Example:* In a forensic pathology program, the CCC reviews students' ability to conduct autopsies, analyze findings, and prepare detailed reports. They use multiple assessment tools, including direct observation, written reports, and practical exams. Ideally, Entrustable Professional Activities (EPA), Competencies and Assessment methods must align with each other for effective implementation of curriculum [6, 7].

#### **Feedback**

Providing constructive feedback is crucial for student development. CCCs analyze assessment data and offer tailored feedback to help learners improve their skills and knowledge [8].

*Example:* After evaluating a student's performance in a simulated crime scene investigation, the CCC provides detailed feedback on evidence collection techniques, accuracy, and adherence to protocols, highlighting both strengths and areas for improvement [9, 10].

#### **Decision-Making**

Based on the assessments and feedback, CCCs make critical decisions regarding students' readiness to advance to the next stage of their

training or to take on specific responsibilities independently [11, 12].

*Example:* A CCC may determine that a student has demonstrated sufficient competence in forensic toxicology to handle real cases under minimal supervision, while another student may need additional training in interpreting complex toxicological data [13].

#### **Members of Clinical Competency Committees**

The composition of a CCC is crucial for its effectiveness. Members typically include faculty with diverse expertise, clinical supervisors, and sometimes external experts.

#### **Faculty Members**

Faculty members bring in-depth knowledge of the curriculum and student performance standards.

*Example:* A forensic chemistry professor who has been teaching and assessing students for several years provides insights into academic performance and progress.

#### **Clinical Supervisors**

Supervisors who directly observe and mentor students in practical settings offer valuable perspectives on students' hands-on skills and professional behavior.

*Example:* A forensic pathologist who oversees students during autopsies shares observations about their practical skills, attention to detail, and adherence to ethical standards.

#### **External Experts**

Involving external experts, such as experienced forensic scientists or legal professionals, can provide an objective view and additional expertise.

*Example:* A seasoned forensic scientist from a crime lab participates in the CCC to offer insights on the latest industry standards and practices, ensuring that the training program aligns with current professional requirements [5].

#### **Line of Action of Clinical Competency Committees**

The line of action for CCCs involves several key steps: data collection, performance review, feedback provision, and progression decisions.

### 1. Data Collection

CCCs gather comprehensive data on student performance from various sources, including exams, practical assessments, direct observations, and self-reflections [14].

*Example:* Throughout a forensic anthropology course, data is collected from written exams, hands-on bone identification tests, and student reflections on case studies.

### 2. Performance Review

The committee reviews the collected data to assess student performance against established competencies. This review is thorough and considers all aspects of the student's abilities [15, 16].

*Example:* The CCC analyzes data from a forensic DNA analysis course, reviewing lab reports, practical test results, and peer evaluations to gauge students' competency in genetic profiling.

### 3. Feedback Provision

After the performance review, the CCC provides detailed, constructive feedback to students, highlighting their strengths and areas for improvement [17, 18].

*Example:* Following the performance review, the CCC meets with each student individually to discuss their progress in forensic document examination, offering specific advice on improving accuracy and technique.

**4. Progression Decisions** Based on the performance review and feedback, the CCC makes decisions regarding students' readiness to progress in their training or take on more complex responsibilities.

*Example:* The CCC decides that a student who has excelled in forensic toxicology is ready to independently handle cases involving toxic substances, while another student may need further supervised practice [19, 20].

### Indian context

Competency-Based Medical Education has been rolled out in India since year 2019 by the National Medical Commission which is a regulatory body previously known as the Medical Council of India [21, 22]. Before 2019, the curriculum had not identified competencies as well as curriculum did not completely match international standards [23 24]. Entrustable Professional Activities (EPA) and concepts of the Clinical Competency Committee are not yet defined and implemented in India which is one of the essential steps for the fruitful implementation of Competency-Based Medical Education (CBME) [25]. Curriculum with EPA and CCC is not able to achieve the desirable goals of CBME as well as to meet international standards of medical education.

### Conclusion

Clinical Competency Committees play a vital role in forensic learning by ensuring comprehensive and objective assessment of student performance, providing constructive feedback, and making informed progression decisions. The diverse expertise of CCC members and their structured line of action contribute to maintaining high educational standards and preparing students for professional practice. As forensic science continues to evolve, CCCs must adapt and refine their processes to meet emerging challenges and uphold the integrity of forensic education.

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