Standards and Guidelines
for the Accreditation of Educational Programs in
Specialist in Blood Bank Technology/Transfusion Medicine

Essentials/Standards initially adopted in 1971;

Adopted by the
AABB
Committee on Accreditation of
Specialist in Blood Bank Technology/Transfusion Medicine
and CAAHEP

The Commission on Accreditation of Allied Health Education Programs (CAAHEP) accredits programs
upon the recommendation of the Committee on Accreditation of Specialist in Blood Bank
Technology/Transfusion Medicine (CoA-SBBT/TM).

These accreditation Standards and Guidelines are the minimum standards of quality used in
accrediting programs that prepare individuals to enter the Specialist in Blood Bank
Technology/Transfusion Medicine (SBBT/TM) profession. Standards are the minimum requirements to
which an accredited program is held accountable. Guidelines are descriptions, examples, or
recommendations that elaborate on the Standards. Guidelines are not required, but can assist with
interpretation of the Standards.

Standards are printed in regular typeface in outline form. Guidelines are printed in italic typeface in
narrative form.

Preamble

The Commission on Accreditation of Allied Health Education Programs (CAAHEP) and AABB
cooperate to establish, maintain and promote appropriate standards of quality for educational programs
in Specialist in Blood Bank Technology/Transfusion Medicine and to provide recognition for educational
programs that meet or exceed the minimum standards outlined in these accreditation Standards and
Guidelines. Lists of accredited programs are published for the information of students, employers,
educational institutions and agencies, and the public.

These Standards and Guidelines are to be used for the development, evaluation, and self-analysis of
Specialist in Blood Bank Technology/Transfusion Medicine programs. On-site review teams assist in
the evaluation of a program’s relative compliance with the accreditation Standards.

Description of the Profession

Individuals board certified as Specialists in Blood Banking are knowledgeable in all aspects of blood
banking, transfusion medicine, hematopoietic, cellular and gene therapies, and tissue transplantation.
These individuals are subject matter experts on a variety of subjects including regulatory and quality
systems, genetics, immunology, blood groups, collection and storage of blood and components, donor
processing, immune mechanisms, component therapy, transfusion of the newborn, complications of
transfusion, general administration, personnel administration, education and automated data
processing.
Specialists in Blood Banking serve in many roles within the transfusion medicine field such as regulatory experts, technical/procedural advisors, laboratory administrators, quality assessors and managers, educators within their field for technical and scientific training in blood transfusion medicine and researchers in transfusion medicine.

I. Sponsorship

A. Sponsoring Educational Institution

A sponsoring institution must be at least one of the following:

1. A post-secondary academic institution accredited by an institutional accrediting agency that is recognized by the U.S. Department of Education, and authorized under applicable law or other acceptable authority to provide a post-secondary program, which awards a minimum of a certificate at the completion of the program.

2. A foreign post-secondary academic institution acceptable to CAAHEP, which awards a minimum of a certificate, or its equivalent, at the completion of the program.

3. A hospital or medical center that is accredited by a healthcare accrediting agency that is recognized by the USDHHS, or a stand-alone transfusion service or blood donor center that is regulated by the U.S. Food and Drug Administration (FDA), and accredited by the AABB or equivalent, which awards a minimum of a certificate at the completion of the program.

4. A branch of the United States Armed Forces, which awards a minimum of a certificate at the completion of the program.

B. Consortium Sponsor

1. A consortium sponsor is an entity consisting of two or more members that exists for the purpose of operating an educational program. In such instances, at least one of the members of the consortium must meet the requirements of a sponsoring institution as described in I.A.

2. The responsibilities of each member of the consortium must be clearly documented in a formal affiliation agreement or memorandum of understanding, which includes governance and lines of authority.

C. Responsibilities of Sponsor

The Sponsor must ensure that the provisions of these Standards are met.

II. Program Goals

A. Program Goals and Outcomes

There must be a written statement of the program’s goals and learning domains consistent with and responsive to the demonstrated needs and expectations of the various communities of interest served by the educational program. The communities of interest that are served by the program must include, but are not limited to, students, graduates, faculty, sponsor administration, employers, physicians, and the public.

Program-specific statements of goals and learning domains provide the basis for program planning, implementation, and evaluation. Such goals and learning domains must be compatible with the mission of the sponsoring institution(s), the expectations of the communities of interest, and nationally accepted standards of roles and functions. Goals and learning domains are based upon the substantiated needs of health care providers and employers, and the educational needs of the students served by the educational program.
B. Appropriateness of Goals and Learning Domains

The program must regularly assess its goals and learning domains. Program personnel must identify and respond to changes in the needs and/or expectations of its communities of interest.

An advisory committee, which is representative of at least each of the communities of interest named in these Standards, must be designated and charged with the responsibility of meeting at least annually, to assist program and sponsor personnel in formulating and periodically revising appropriate goals and learning domains, monitoring needs and expectations, and ensuring program responsiveness to change.

Advisory committee meetings may include participation by synchronous electronic means.

C. Minimum Expectations

The program must have the following goal defining minimum expectations: “To prepare competent entry-level Specialists in Blood Bank Technology/Transfusion Medicine (SBBT/TM) in the cognitive (knowledge), psychomotor (skills), and affective (behavior) learning domains.”

Programs adopting educational goals beyond entry-level competence must clearly delineate this intent and provide evidence that all students have achieved the basic competencies prior to entry into the field.

Nothing in this Standard restricts programs from formulating goals beyond entry-level competence.

III. Resources

A. Type and Amount

Program resources must be sufficient to ensure the achievement of the program’s goals and outcomes. Resources must include, but are not limited to: faculty; clerical and support staff; curriculum; finances; offices; classroom, laboratory, and, ancillary student facilities; clinical affiliates; equipment; supplies; computer resources; instructional reference materials, and faculty/staff continuing education.

B. Personnel

The sponsor must appoint sufficient faculty and staff with the necessary qualifications to perform the functions identified in documented job descriptions and to achieve the program’s stated goals and outcomes.

1. Medical Director

   a. Responsibilities

      The Medical Director of the program must provide competent direction and/or guidance to ensure that the medical components of the curriculum, both didactic and supervised clinical practice, meet current acceptable performance standards.

   b. Qualifications

      The Medical Director must:

      1) Have current experience and be currently active in immunohematology and hemotherapy; and

      2) Be a physician currently licensed and board certified in any of the following Transfusion Medicine, Hematology, Internal Medicine, Clinical Pathology, or Anesthesia and Pediatrics.
Current experience in immunohematology and hemotherapy should include at least 2 years of experience within the last 10 years.

2. Program Director
   a. Responsibilities
      The Program Director must be responsible for the organization, administration, continuous review, planning, development, and the effectiveness of the program.
   b. Qualifications
      The Program Director must:
      1) Be either a physician, a certified Specialist in Blood Banking or clinical laboratory administrator;
      2) Have current experience in immunohematology and hemotherapy;
      3) Demonstrate technical competence documented with annual continuing education in immunohematology and hemotherapy; and
      4) Demonstrate current experience in education, teaching techniques, including methods of testing, and evaluating students.

      Current experience should include at least 2 years of experience within the last 10 years.

3. Education Coordinator
   a. Responsibilities
      The Education Coordinator must:
      1) Be responsible for the supervision, administration, and coordination of the instructional staff in the didactic, laboratory, and clinical phases of the educational program; and
      2) Demonstrate effective methods of testing and evaluating students
   b. Qualifications
      The Education Coordinator must:
      1) Hold certification as a Specialist in Blood Banking or an equivalent specialist certification recognized by other countries;
      2) Have current experience in a blood bank or transfusion service;
      3) Demonstrate technical competence documented with annual continuing education in immunohematology and hemotherapy; and
      4) Demonstrate current experience in education, teaching techniques, including methods of testing and evaluating students

      Current experience should include at least 2 years of experience within the last 10 years.
The positions of Medical Director/Advisor and/or Program Director and/or Education Coordinator may be held by the same person provided that the qualifications and responsibilities of all positions are met.

4. Faculty and/or Instructional Staff
   a. Responsibilities
      In each location where a student is assigned for didactic or supervised clinical practice instruction, there must be an individual with direct work experience in the respective area designated to provide supervision and assessments of the student's progress in achieving program requirements.
   b. Qualifications
      All faculty/instructional staff must
      1) Show evidence of relevant certification, licensure or equivalent credential in the subject areas;
      2) Demonstrate effective methods of testing and evaluating students;
      3) Have current experience in their respective area; and
      4) Demonstrate participation in internal or external programs of continuing education
      *Current experience should include at least 1 year of experience within the last 10 years.*

C. Curriculum
   The curriculum must ensure the achievement of program goals and learning domains. Instruction must be an appropriate sequence of classroom, laboratory, and clinical activities. Instruction must be based on clearly written course syllabi that include course description, course objectives, methods of evaluation, topic outline, and competencies required for graduation.

   The program must demonstrate by comparison that the curriculum offered meets or exceeds the content listed in Appendix B of these Standards and Guidelines.

D. Resource Assessment
   The program must, at least annually, assess the appropriateness and effectiveness of the resources described in these Standards.

   The results of resource assessment must be the basis for ongoing planning and appropriate change. An action plan must be developed when deficiencies are identified in the program resources. Implementation of the action plan must be documented and results measured by ongoing resource assessment.

IV. Student and Graduate Evaluation/Assessment
   A. Student Evaluation
      1. Frequency and purpose
         Evaluation of students must be conducted on a recurrent basis and with sufficient frequency to provide both the students and program faculty with valid and timely indications of the
students’ progress toward and achievement of the competencies and learning domains stated in the curriculum.

2. Documentation
Records of student evaluations must be maintained in sufficient detail to document learning progress and achievements.

B. Outcomes
1. Outcomes Assessment
The program must periodically assess its effectiveness in achieving its stated goals and learning domains. The results of this evaluation must be reflected in the review and timely revision of the program.

Outcomes assessments must include, but are not limited to: national credentialing examination(s) performance, programmatic retention/attrition, graduate satisfaction, employer satisfaction, job (positive) placement, and programmatic summative measures. The program must meet the outcomes assessment thresholds.

“Positive placement” means that the graduate is employed full or part-time in the profession or in a related field; or continuing his/her education; or serving in the military. A related field is one in which the individual is using cognitive, psychomotor, and affective competencies acquired in the educational program.

2. Outcomes Reporting
The program must periodically submit to the CoA-SBBT/TM the program goal(s), learning domains, evaluation systems (including type, cut score, and appropriateness), outcomes, its analysis of the outcomes, and an appropriate action plan based on the analysis.

Programs not meeting the established thresholds must begin a dialogue with the CoA-SBBT/TM to develop an appropriate plan of action to respond to the identified shortcomings.

V. Fair Practices

A. Publications and Disclosure
1. Announcements, catalogs, publications, and advertising must accurately reflect the program offered.

2. At least the following must be made known to all applicants and students: the sponsor’s institutional and programmatic accreditation status as well as the name, mailing address, web site address, and phone number of the accrediting agencies; admissions policies and practices, including technical standards (when used); policies on advanced placement, transfer of credits, and credits for experiential learning; number of credits required for completion of the program; tuition/fees and other costs required to complete the program; policies and processes for withdrawal and for refunds of tuition/fees.

3. At least the following must be made known to all students: academic calendar, student grievance procedure, criteria for successful completion of each segment of the curriculum and for graduation, and policies and processes by which students may perform clinical work while enrolled in the program.

4. The sponsor must maintain, and make available to the public current and consistent summary information about student/graduate achievement that includes the results of one or more of the outcomes assessments required in these Standards.
The sponsor should develop a suitable means of communicating to the communities of interest the achievement of students/graduates (e.g., through a website or electronic or printed documents).

B. Lawful and Non-discriminatory Practices
All activities associated with the program, including student and faculty recruitment, student admission, and faculty employment practices, must be non-discriminatory and in accord with federal and state statutes, rules, and regulations. There must be a faculty grievance procedure made known to all paid faculty.

C. Safeguards
The health and safety of patients, students, faculty, and other participants associated with the educational activities of the students must be adequately safeguarded.

All activities required in the program must be educational and students must not be substituted for staff.

D. Student Records
Satisfactory records must be maintained for student admission, advisement, counseling, and evaluation. Grades and credits for courses must be recorded on the student transcript and permanently maintained by the sponsor in a safe and accessible location.

E. Substantive Change
The sponsor must report substantive change(s) as described in Appendix A to CAAHEP/CoA-SBBT/TM in a timely manner.

F. Agreements
There must be a formal affiliation agreement or memorandum of understanding between the sponsor and all other entities that participate in the education of the students describing the relationship, roles, and responsibilities of the sponsor and that entity.
APPENDIX B

Curriculum for Educational Programs in
Specialist in Blood Bank Technology/Transfusion Medicine

The curriculum requirements are designed to provide an organizing framework that includes at a minimum foundational knowledge in blood banking and transfusion medicine.

The SBBT/TM Program must develop and design basic and advanced concepts within the cognitive/didactic, psychomotor, and affective learning domains to address the following topics, at a minimum:

1. Blood Products
   a. Donors
   b. Donor Processing
   c. Blood Product Storage
   d. Blood Components and Quality Control

2. Blood Group Systems
   a. Blood Group Genetics
   b. Blood Group Biochemistry/Antigens
   c. Role of Blood Groups in Transfusion

3. Immunology and Physiology
   a. Immunology
   b. Physiology and Pathophysiology Related to Blood and Blood Transfusion

4. Serologic and Molecular Testing
   a. Routine Blood Bank Testing
   b. Blood Bank Reagents
   c. Application of Special Tests and Reagents
   d. Leukocyte and Platelet Testing
   e. Quality Assurance of Serologic and Molecular Testing

5. Transfusion Practice
   a. Indications and Contraindications for Blood Transfusion
   b. Component Therapy
   c. Adverse Effects of Transfusion
   d. Apheresis and Extracorporeal Circulation
   e. Blood Administration
   f. Patient Blood Management

6. Laboratory Operations
   a. Quality Assessment and Problem Solving
   b. Laboratory Safety
   c. Laboratory Mathematics
   d. Laboratory Instrumentation
   e. Laboratory Administration and Management