



National Accreditation Board for Testing and Calibration Laboratories
(A Constituent Board of Quality Council of India)

NABL
INDIA



NABL ACCREDITATION

(National Accreditation Board
for Testing and Calibration
Laboratories)

❖ INTRODUCTION:

- ▶ Laboratory studies form an important part of assessing the quality of products.
- ▶ For results to be accepted at national and international levels, they must be proven to be reliable.
- ▶ *DEFINITION:-*
- ▶ Accreditation of laboratories is a process through which an authorized, independent agency examines and certifies the competence and quality systems of a laboratory based on particular predefined standards.

- ▶ Accreditation provides formal recognition of the technical competence of a laboratory for particular measurements or tests based on results from a third party assessments.

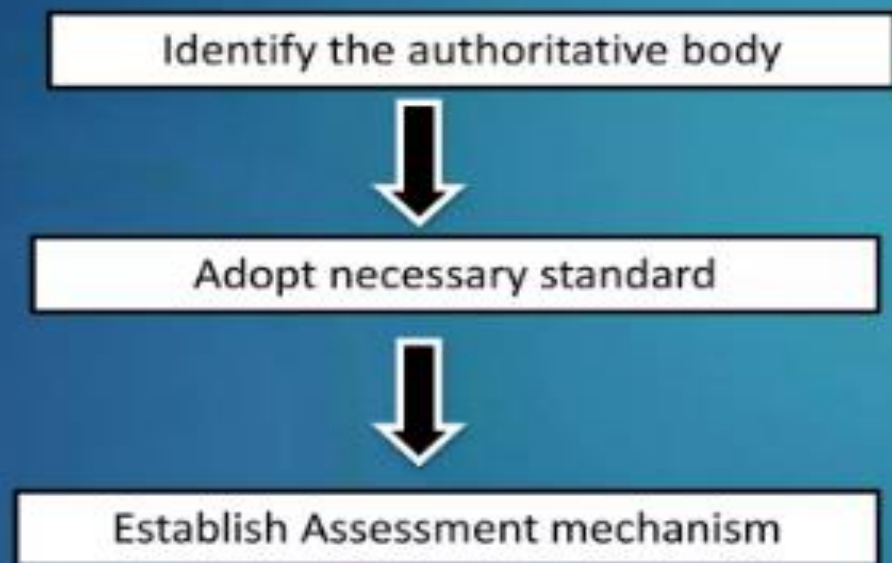


Fig.1 : Accreditation Process

What is NABL ?

- ▶ NABL is an autonomous society providing Accreditation (Recognition) of Technical competence of a testing, calibration, medical laboratory & Proficiency testing provider (PTP) & Reference Material Producer (RMP).
- ▶ NABL specifies the general requirements for the competence to carry out tests and calibrations, including sampling. It covers testing and calibration performed using standard methods, non-standard methods, and laboratory-developed methods.

- NABL is an autonomous body under the aegis of Department of Science & Technology, Government of India, and is registered under the Societies Act.
- NABL stands for **National Accreditation Board For Testing And Calibration Laboratories.**
- NABL has agreements with ILAC (International Laboratory Accreditation Conference) and APLAC (Asia Pacific Laboratory Accreditation Cooperation).

□ Benefits of Accreditation:

- ▶ Potential increase in business due to enhanced customer confidence and satisfaction.
- ▶ Savings in terms of time and money due to reduction or elimination of the need for re-testing .
- ▶ Better control of laboratory operations and feedback to laboratories as to whether they have sound Quality Assurance System and are technically competent.

- 
- ▶ Increase of confidence in Testing / Calibration data and personnel performing work.
 - ▶ Customers can search and identify the laboratories accredited by NABL for their specific requirements from the directory of Accredited Laboratories.
 - ▶ Users of accredited laboratories will enjoy greater access for their products, in both domestic and international markets, when tested by accredited laboratories.
- 

❖ Types Of Laboratory Can Seek Accreditation:

- ▶ Laboratories undertaking any sort of testing or calibration in the specified fields.
- ▶ Private or government laboratories.
- ▶ Small operations to large multi-field laboratories.
- ▶ Site facilities, temporary field operations and mobile laboratories.

TESTING LABORATORIES	CALIBRATION LABORATORIES	MEDICAL LABORATORIES
<ul style="list-style-type: none"> • Biological • Chemical • Electrical • Electronics • Fluid-Flow • Mechanical • Non-Destructive Testing • Photometry • Radiological • Thermal • Forensic 	<ul style="list-style-type: none"> • Electro-Technical • Mechanical • Fluid Flow • Thermal & Optical • Radiological 	<ul style="list-style-type: none"> • Clinical Biochemistry • Clinical Pathology • Haematology & Immunohaematology • Microbiology & Serology • Histopathology • Cytopathology • Genetics • Nuclear Medicine (<i>in-vitro tests only</i>)
PROFICIENCY TESTING PROVIDERS		REFERENCE MATERIAL PRODUCERS
<ul style="list-style-type: none"> • Testing • Calibration • Medical • Inspection 		<ul style="list-style-type: none"> • Chemical Composition • Biological & Clinical Properties • Physical Properties • Engineering Properties • Miscellaneous Properties

PROCESS OF NABL ACCREDITATION

1. Stage 1 (Filling of Application)
2. Stage 2 (Pre-Assessment Audit)
3. Stage 3 (Final Assessment)
4. Stage 4 (Corrective Reassessment)
5. Stage 5 (Granting of Accreditation)

STAGE 1

1. Prepare your laboratory application for NABL accreditation, giving all desired information.
2. Laboratory can apply either for all or part of their testing / calibration facilities.
3. Laboratories are required to submit five sets of duly filled in application forms for each field of testing/ calibration along with five sets of quality manual and application fees.
4. NABL secretariat on receipt of application will issue to the acknowledgement to the laboratory.
5. Nominate a Lead Assessor for giving Adequacy Report on the Quality Manual.
6. After satisfactory report , a pre-assessment audit of the laboratory will organized.

STAGE 2

1. NABL Secretariat shall organize the Pre-Assessment audit.
2. Its helps the laboratory to be better prepared for the final assessment.
3. A copy of Pre-Assessment report will be provided to laboratory.
4. The laboratory shall submit corrective action report to NABL secretariat.
5. After laboratory confirms the completion of corrective actions, final assessment shall be organized.

STAGE 3

1. NABL Secretariat shall organize the Final Assessment.
2. The Assessment team shall comprise of a lead Assessor and other Technical Assessors.
3. Send a copy of report to the laboratory and original copy to NABL Secretariat.
4. Lab. Shall take necessary corrective action on the remaining Non-Conformance and shall submit a report to NABL within a period of 2 months.

STAGE 4

1. After satisfactory corrective action by laboratory, the accreditation committee examines the findings of the Assessment Team.
2. Laboratory shall have to take corrective action on any concerns raised by the AC
3. AC shall make the appropriate recommendations regarding accreditation of a laboratory to NABL Secretariat.
4. Laboratory are free to appeal against the findings of assessment.

STAGE 5

1. Accreditation to a laboratory shall be valid for a period of 3 years
2. Laboratory shall apply for Renewal of accreditation to it at least 6 months before the expiry of the validity of accreditation.

❖ Preparing for Accreditation:-

- ✓ Obtain NABL documents from the NABL Secretariat to get familiar with the assessment process and details required for the application.
- ✓ Ensure training of one person by NABL on quality Management System and Internal Audit.
- ✓ Prepare a quality manual in keeping with the standards.
- ✓ For each test / investigation done in the laboratory, prepare a SOP.
- ✓ Calibrate instruments and equipment used in testing.

- ✓ Train Personal on documentation aspects.
- ✓ Check the status of current technical competence and quality system by comparing with NABL Standards and address deficiencies encountered.
- ✓ Prepare a quality manual and all other documents required by NABL.
- ✓ Include Internal Quality Control(IQC) in sample analysis.
- ✓ Take part in External Quality Assessment Schemes(EQAs)
- ✓ Evaluate compliance with IQC and EQAs; take corrective actions where necessary.
- ✓ Perform internal audit and management review to assess preparedness for NABL assessment.
- ✓ After everything is satisfactory, apply for accreditation to NABL with the prescribed fees.