

Guidelines for the condemnation and replacement of Tuberculosis (TB) laboratory equipment under the Revised National Tuberculosis Control Programme (RNTCP)

(If Condemnation Guidelines do not exist at State / Institute level, these guidelines may be followed)

1. Background:

Adequate maintenance of equipment in TB laboratories under Revised National Tuberculosis Control Programme (RNTCP) is critical to provide uninterrupted services. Variety of laboratory equipment is required for proper functioning of TB laboratories (*Annexure 1*).

Despite careful use and adequate maintenance, certain equipment either becomes obsolete or beyond economic repair over a period of time. Continuous use of equipment & various other factors including environmental factors cause progressive wear and tear and render the equipment unserviceable. Such equipment needs to be replaced to avoid interruption in services. However, prior to replacement, the equipment needs to be condemned in an appropriate manner. The process of condemnation is usually delayed or the condemnation does not happen due to lack of specific guidelines for condemnation and subsequent replacement of condemned TB laboratory equipment. Few States and institutes follow their own policy but largely the condemnation procedures are not undertaken on a regular basis.

This document is aimed to provide necessary guidance for condemnation and replacement of TB laboratory equipment by respective States / Union Territories/ other Institutes.

2. Scope:

2.1. Guidelines for condemnation of non-functional, obsolete, non-reparable equipment in RNTCP's laboratories.

2.2 Guidelines for replacement of equipment in the event of equipment condemnation, or equipment irreparability.

2.3 Action to be taken in case of surplus equipment

3. Definition

3.1 Condemnation of equipment: It is a process of conducting an evaluation to determine whether the said laboratory equipment should be removed from the service and sent for disposal. The list of laboratory equipment which needs to be condemned shall be placed before the condemnation committee. The committee would examine parameters such as asset life, reparability, cost of repair, and

recommend condemnation of the equipment as per details in section 4. Equipment can be considered for condemnation, if any of the following conditions exist:

- a. **Irreparable/ Unserviceable:** The equipment has been examined by competent service agency and has been declared to be irreparable/ unserviceable due to any reason including non-availability of spare parts.
- b. **Obsolete:** clinically or technically obsolete, or changes in local policies for device use
- c. **Unsafe:** does not comply with safety requirements defined by the manufacturers
- d. **Cost:** Cost of repair is not economical as defined in section 5
- e. **Surplus:** without a useful purpose for the health facility / laboratory but may be transferred or donated

3.2 Replacement of equipment: Replacement of laboratory equipment may be required when the equipment is condemned, non-reparable or unfit for use. Depending upon equipment that is not functional, obsolete or irreparable, the laboratory/ institute will weigh the asset life and usage of laboratory equipment and suggest replacement, if necessary.

4. Guidelines for condemnation and replacement of unfit equipment:

In order to condemn equipment and / or consider it for replacement following guidelines should be applied in all RNTCP Laboratories:

4.1 Condemnation of obsolete, irreparable/ unserviceable and unsafe equipment¹⁻⁵

4.1.1. Identification of obsolete, unserviceable & unfit equipment shall be done by respective laboratory. Minimum criteria to be followed for condemnation of equipment is given below: The equipment has become:

- a) non-functional and irreparable/ unserviceable
- b) Non-functional and beyond economical repair¹
- c) Obsolete
- d) Unsafe (Environment hazard / Bio-hazardous)

4.1.2. Proposal shall be put up by Laboratory In-charge through Director / Head of the Institution / laboratory, in the prescribed format (Annexure 2 & 3) to respective Condemnation Committee (described in 4.1.3).

4.1.3. Condemnation Committee: Condemnation committee shall be constituted with the approval of the competent authority (STO/ Head / Director of the Institution / laboratory) and should include the following members:

- Head of the Department (HOD)
- Representative from Finance Department
- Representative from the Procurement Department/ Stores/ Administration Department
- Laboratory Microbiologist / IRL Microbiologist
- Institute/Department Engineer/ Institute Biomedical Engineer (if available)
- Any other member as nominated by the competent authority

4.1.4. The condemnation committee should examine the proposal in detail and take into consideration asset life of the laboratory equipment as detailed in section 5. In case, such period is not prescribed / stipulated, the committee should examine the equipment history sheet and conduct physical verification of equipment and record reasons for consideration of condemnation.

4.1.5. The recommendation of the Condemnation Committee will be put up to the competent authority for approval.

4.1.6 Ongoing Annual Maintenance Contract / Comprehensive Maintenance Contract, if any, for such equipment should be terminated with the effective date of condemnation

4.1.7. Disposal of condemned equipment shall be done by the laboratory /institute as per the existing guidelines for disposal. In case such guidelines are not available, laboratory / institute can follow General Financial Rules 2017, Govt. of India (GOI) for disposal of condemned equipment ²⁻⁴

4.2 Replacement of condemned equipment

In order to consider equipment for replacement, the following documents need to be submitted to State/Central TB Division, Ministry of Health and Family Welfare, Govt of India.

4.2.1 Condemnation certificate issued by the laboratory condemnation committee which certifies that the equipment is non-functional and irreparable along with reasons for irreparable.

4.2.2 Request for replacement of equipment can be made by submitting the condemnation certificate by laboratory/ institute to concerned authorities (State/CTD).

5. Criteria for deciding asset life and acceptable repair cost of equipment

- 5.1 The asset life of laboratory equipment used in RNTCP laboratories is 10 years. The equipment functioning well beyond its asset life should continue to be used. However, depending upon its usage, serviceability, technology and other related factors, equipment may become unusable/beyond economic repair before 10 years of use.
- 5.2 The equipment which has exceeded its asset life of 10 years and the cost of repair during that financial year cumulatively is equal to or over 25% of the procurement cost of the equipment can be considered for condemnation, and replacement if required.
- 5.3 The equipment which are within the asset life and the cost of repair during that financial year cumulatively is equal to or over 50% of the procurement cost of the equipment, can be considered for condemnation, and replacement if required
- 5.4 For equipment, which is non-functional and certified as non-reparable by service agency/manufacturer due to non- availability of spare parts, irrespective of the asset life, the equipment can be considered for condemnation and replacement if necessary.
- 5.5 In case the procurement cost of the equipment is not available (e.g. it was received as donation) then the current cost of the same make and model or equivalent make or model can be used to assess the acceptable cost for repair.
- 5.6 For equipment which is obsolete or hazardous irrespective of its asset life or functionality can be considered for condemnation and replacement if necessary. The condemnation certificate should mention the details based on which the equipment has been declared obsolete or hazardous.

6. Surplus Equipment:

- 6.1 In case the equipment is surplus the laboratory/ site should consider relocating the equipment to another laboratory/ site where it can be productively used.
- 6.2 In case the equipment cannot be relocated it can be considered for condemnation and the certificate should mention the reason for condemnation as surplus.
- 6.3 In case of condemnation on the basis of being surplus no replacement will be made.

7. Replacement Process:

- 7.1 The request for replacement of equipment condemned as per the above guideline will be submitted to STO/CTD in the format specified in Annexure 4 by the respective laboratory.

7.2 In instances, where condemnation report is not available due to valid reasons, the same can be considered for condemnation and replacement by STO/CTD on case to case basis.

7.3 Authorized body (State/CTD) will review the request for replacement and the decision will be communicated within one month to the concerned laboratory

7.4 Document to be submitted for replacement:

- Certificate of condemnation by the condemnation committee.
- Annexure 3 and 4 with required details.
- In case the replacement is not approved by the concerned authority then **the respective laboratory should be informed in writing accordingly.**

8. References:

1. Companies Act (2013), Section XIII, Page No. 258(<http://www.mca.gov.in/Ministry/pdf/CompaniesAct2013.pdf>)
2. Bureau of Indian Standards (BIS) Central Laboratory Office Order. 2005(<https://bis.gov.in/qazwsx/lab/disposal.pdf>)
3. Guidelines for Condemnation. Indian Council of Medical Research (ICMR). (<https://www.icmr.nic.in/sites/default/files/guidelines/Guidelines%20for%20Condemnation.pdf>)
4. General Financial Rules, 2017. Government of India Guidelines published in 2017(Chapter 7, Rule No. 217 to Rule 223) (https://doe.gov.in/sites/default/files/GFR2017_0.pdf)
5. Income Tax Act 2003-04, section XIII; (<https://www.incometaxindia.gov.in/charts%20%20tables/depreciation%20rates.htm>)
6. Medical Equipment maintenance policy. 2012. Published by Employees State Insurance Corporation. Panchdeep Bhavan. C.I.G. Road. New Delhi. (<https://www.esic.nic.in/Publications/MEMP070812.pdf>)

Annexure 1: List of equipment required for functioning of TB Laboratory

S. No.	List of Equipment
1	Biosafety Cabinet
2	Laminar Flow Cabinet
3	MGIT 960 System
4	Autoclave
5	Water Distillation Unit
6	Hot air oven
7	Water bath
8	Incubator
9	Inspissator
10	Micro Incinerator
11	Pipette
12	Thermocycler
13	Thermometer (Flexible)
14	Walk in Cold Room
15	Walk in Incubator
16	Micro-Centrifuge
17	Refrigerated Centrifuge
18	Weighing Balance
19	Twincubator
20	GT Blot 48
21	Bottle washing machine
22	Magnetic Stirrer with heating plate
23	Minispin
24	PCR Workstation
25	Shaker
26	Vortex Mixer
27	CBNAAT
28	Freezer (-20)
29	Deep Freezer (-80)
30	Refrigerator
31	Microscope
32	PH Meter
33	UPS with battery back up
34	Generator
35	Voltage Stabilizer
36	Hot Plate
37	Any other existing laboratory equipment under RNTCP
38	Any other new laboratory equipment added by RNTCP

Annexure 2: Equipment History Sheet⁶

History Sheet should be maintained for all equipment and it should include following key information related to the equipment:

1. Identification data of equipment, such as make, model, serial number and date of purchase/ receipt (in case of donation, transfer *etc.*.)
2. Purchase cost and warranty applicability
3. Identification of source of funding/ supply of equipment
4. Details of the supplier, availability of the spares
5. Date of installation of the equipment
6. Details of breakdown and downtime of equipment
7. Repairs undertaken
8. Current status of functioning of equipment
9. Details of the procurement procedure i.e. tender enquiry or through DGS&D (Directorate General of Supplies and Disposal)
10. Equipment brochure containing information about how to handle the instrument step by step

Annexure 3: Information required in the condemnation certificate

As per GFR 2017 Rule 217, a report for disposal of the items shall be prepared in accordance with Form GFR-10 as below:

FORM GFR 10

GENERAL FINANCIAL RULES 2017
Ministry of Finance
Department of Expenditure



FORM GFR 10

[See Rule 217 (iii)]

**REPORT OF SURPLUS, OBSOLETE AND
UNSERVICABLE STORES FOR DISPOSAL**

Item No.	Particulars of stores	Quantity/ Weight	Book Value/ Original purchase price	Condition and year of purchase	Mode of disposal (sale, public auction or otherwise)	Remarks
1	2	3	4	5	6	7

Signature.....

Designation.....

Date.....

Annexure 4: Detail of equipment in the specified format

Laboratory Name	Equipment Name	Quantity	Make	Model	Serial No.	Date of Purchase/ Installation	Date of breakdown	Date on which equipment is declared irreparable/ condemned	Status (Condemnation certificate/ Agency report along with laboratory endorsement)	Justification	Standby Equipment in laboratory	Remarks

The minutes of the Laboratory/Institute Condemnation Committee should be signed by all the members of the committee with name, designation and on the same date and submitted to authorized committee (CTD/State TB Cell/ Institute Authority/FIND)