

ESSENTIAL MEDICINE LIST



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DEFINITION

Essential medicines are those that satisfy the priority health care needs of the population at all time.

INTRODUCTION

The concept of essential medicines - A limited range of carefully selected essential medicines leads to:

1. Better health care

2. Better drug management

3. Lower costs

INTRODUCTION

They should be available at all times:

1. In adequate amounts

2. In appropriate dosage forms

3. In adequate strengths with assured quality

At affordable price

INTRODUCTION

- Selection criteria: Essential medicines are selected with due regard to disease prevalence, public health relevance, evidence on efficacy and safety, and comparative cost-effectiveness
- Purpose: Essential medicines are intended to be available within the context of functioning health systems at all times, in adequate amounts, in the appropriate dosage forms, with assured quality, and at a price the individual and the community can afford.
- Implementation: The implementation of the concept of essential medicines is intended to be flexible and adaptable to many different situations; exactly which medicines are regarded as essential remains a national responsibility

SELECTION CRITERIA

Essential medicines are selected with due regard to:

1. Disease prevalence

2. Public health relevance

3. Evidence on efficacy and safety

4. Comparative cost-effectiveness

PURPOSE

Essential medicines are intended to be available within the context of functioning health systems at all times, in adequate amounts, in the appropriate dosage forms, with assured quality, and at a price the individual and the community can afford.

IMPLEMENTATION

The implementation of the concept of essential medicines is intended to be flexible and adaptable to many different situations; exactly which medicines are regarded as essential remains a national responsibility

HISTORY OF THE WHO MODEL LIST OF ESSENTIAL MEDICINES

- Tanzania was the first country in the world to compose Essential Medicine List
- 1977 First Model list published by WHO, ± 200 active substances
- List is revised every two years by WHO Expert Committee
- 21st WHO model EML published in June 2019, is proof that the concept is still valid after nearly 43 years and continues to have many advantages when it is used appropriately and in conjunction with standard treatment guidelines.

CRITERIA FOR SELECTION OF ESSENTIAL MEDICINES

WHO list of essential medicines - Model or “guiding list”

1. **Quality of drugs** – Only those drugs should be selected for which sound & adequate data on safety & efficacy are available.
2. **Pattern of prevalent disease** – Most effective drug against locally prevalent disease is selected.
3. **Cost** – Major consideration in drug selection Cost of total treatment & not just one unit must be considered.
4. **Benefit risk ratio** – When several comparable drugs are available for same therapeutic indication, drug which provides most favourable benefit / risk ratio is to be selected.

CRITERIA FOR SELECTION OF ESSENTIAL MEDICINES

5. When two or more drugs are therapeutically equivalent preference should be given to –

- a. Better understood drug.
- b. Clinical utility – Treatment of more than one condition or disease.
- c. Favourable pharmacokinetic profile preferred.
- d. Favourable stability under local anticipated conditions.
- e. Local reliable manufacturing facilities exist.

6. Dosage forms –

Selection of dosage forms –

- On the basis of general utility & wider availability
- Restricts number of preparations to minimum.

CRITERIA FOR SELECTION OF ESSENTIAL MEDICINES

7. Financial resources – 20% of total expenditure on health is spent on drugs.
8. Genetic, Demographic & Environmental factors.
9. Mortality and morbidity statistics.
10. Local manufacture and storage facilities.
11. Selection of essential medicines should be a continuous process.
12. Essential medicines should be based on rationally developed treatment guidelines.

ADVANTAGES OF ESSENTIAL MEDICINE LIST

- More cost effective drug control, management, purchase, storage and distribution.
- Improved drug use in terms of safety, simplified and more efficient drug information including training to health worker.
- Identification & avoidance of adverse drug reaction and interaction.
- Stimulation of local drug formulation and production.

ADVANTAGES OF ESSENTIAL MEDICINE LIST

- Reduced freedom of choice.
- Creation of monopolies – Favouring a single drug product.
- Reduced possibilities for gaining episodic experience e.g. new application of old drug.
- Lack of interest for drug innovation.

WHAT IS CORE LIST AND COMPLEMENTARY LIST?

- **Core list –**

- List of minimum medicine needs for a basic health care system, listing the most efficacious , safe and cost effective medicines for priority conditions.

- **Complementary list –**

- Essential medicines for priority diseases , for which specialised diagnostic or monitoring facilities and or specialist medical care and or specialist training are needed.

RATIONAL USE OF DRUGS

- The rational use of drugs requires that patients receive medications appropriate to their clinical needs, in doses that meet their own individual requirements for an adequate period of time, and at the lowest cost to them and their community. (WHO conference of experts Nairobi 1985)
- Correct drug
- Appropriate indication
- Appropriate drug considering efficacy, safety, suitability for the patient, and cost
- Appropriate dosage, administration, duration
- No contraindications
- Correct dispensing, including appropriate
- Patient adherence to treatment

EXAMPLES OF IRRATIONAL DRUG USE

- Prescribing drugs of no proven value.
- Prescribing empirically.
- Unnecessary prescribing for self limiting conditions.
- Over dosing and under dosing.
- Prescribing costly drugs.
- Using injections when oral drugs would sufficient.

NATIONAL LIST OF ESSENTIAL MEDICINES INDIA (NLEM)

- Introduced & controlled by Ministry of Health & Family Welfare (MOHFW), GOI
- First NLEM 1996 (Revised in 2003)
- NLEM 2011 (348 Drugs)
- NLEM 2015 [376 Drugs (106 added & 70 deleted)]
- Category of Drugs (On basis of health care and disease burden)
 - P → Primary (206)
 - S → Secondary (115)
 - T → Tertiary (79)(106 additions and 70 deletions)
- Medicines deleted from NLEM-2003 (47 Drugs)

PRACTICAL APPLICATIONS OF NLEM

- Policy making
- Management
- Selection
- Procurement
- Distribution
- Quality assurance
- Financing
- Promoting rational use
- Training of health Professionals
- For providing medicines information & education
- Cost effective therapy

PURPOSE OF NLEM

- Guides safe and effective treatment of priority disease conditions.
- Promote the rational use of medicines
- Optimize the available health resources of a country
- NLEM-a guiding document for
 - State governments to prepare their list of essential medicines
 - Procurement and supply of medicines in the public sector
 - Reimbursement of cost of medicines by organizations to its employees
 - Reimbursement by insurance companies identifying the 'MUST KNOW' domain for

CONSIDERATIONS FOR FRAMING THE NLEM 2015

- Essentiality
- Changing disease burden
- Efficacy and Safety
- Comparative cost-effectiveness
- Feasibility in context of advantage and cost-effectiveness
- Fixed dose combinations (FDC)
- Sales turnover
- Hierarchy of healthcare structure
 - Primary care facility (P)
 - Secondary care facility (S)
 - Tertiary care facility (T)

CRITERIA FOR INCLUSION OF A MEDICINE IN NLEM 2015

- The medicine should be approved/licensed in India.
- The medicine should be useful in disease which is a public health problem in India.
- The medicine should have proven efficacy and safety profile based on valid scientific evidence.
- The medicine should be cost effective.
- The medicine should be aligned with the current treatment guidelines for the disease.
- The medicine should be stable under the storage conditions in India.

CRITERIA FOR INCLUSION OF A MEDICINE IN NLEM 2015

- When more than one medicine are available from the same therapeutic class, preferably one prototype/ medically best suited medicine of that class to be included after due deliberation and careful evaluation of their relative safety, efficacy, cost-effectiveness.
- Price of total treatment to be considered and not the unit price of a medicine.
- Fixed Dose Combinations (FDCs) are generally not included unless the combination has unequivocally proven advantage over individual ingredients administered separately, in terms of increasing efficacy, reducing adverse effects and/or improving compliance.
- The listing of medicine in NLEM is based according to the level of health care, i.e. Primary (P), Secondary (S) and Tertiary (T) because the treatment facilities, training, experience and availability of health care personnel differ at these levels.

CRITERIA FOR DELETION OF A MEDICINE FROM NLEM 2015

- The medicine has been banned in India.
- There are reports of concerns on the safety profile of a medicine.
- A medicine with better efficacy or favorable safety profiles and better cost-effectiveness is now available.
- The disease burden for which a medicine is indicated is no longer a national health concern in India.
- In case of antimicrobials, if the resistance pattern has rendered a medicine ineffective in Indian context.

TAKE HOME MESSAGE

- **E** – Efficacy
- **S** – Safety and suitability
- **S** - Storage and stability
- **E** - Ease of administration (dosage form)
- **N** - Need of population
- **T** - Total cost
- **I** - Irrational combination to be avoided
- **A** - Availability, Affordability
- **L** - Listing regularly (updating)

IMPORTANT LINKS

Below are links to access the complete list of essential medicines in **ASSAM**

1. Essential drug list 2019-20

https://nhm.assam.gov.in/sites/default/files/swf_utility_folder/departments/nhm_lipl_in_oid_6/menu/schemes/notification_essential_drugs_list_2019-20.pdf

2. Essential drug list for Primary, Secondary and Tertiary health care facilities

http://nhm.lipl.in/sites/default/files/swf_utility_folder/departments/nhm_lipl_in_oid_6/do_u_want_2_know/1-PST_EDL.pdf

3. Essential drug list for Sub-centre

http://nhm.lipl.in/sites/default/files/swf_utility_folder/departments/nhm_lipl_in_oid_6/do_u_want_2_know/2-SC_EDL.pdf

THANK YOU