INTRODUCTION & HISTORY OF ETHICAL GUIDELINES

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OVERVIEW

- What is ethics?
- Background history
- Development of guidelines/ Indian experience
- Ethics committee

SOME MAJOR QUESTIONS

- Is it ethical to have genetic screening and allow abortion of foetuses?
- Is it ethical to legalise euthanasia or human cloning?
- How can a society facilitate clinical research and at the same time protect people from abuse and harm?

- Term is derived from the Greek word *ethos* which mean custom, habit, character

- Ethics is a system of moral principles- study of values, so as to decide what is right and what is wrong

WHY ETHICS?

Identifying and implementing the acceptable conditions for exposure of some individuals to risks and burdens for the benefit of the society at large.

General Ethical Principles

- Respect for persons
- Beneficence-***nonmaleficence***
- Justice

Oldest ethical principles

- Charak Samhita- asks to follow path of personal sacrifice and commitment to duty
- Hippocratic oath
- Hammurabi's Code (18th century b.c.)

NO DEMOCRACY

- Kings used to keep food testers who ate the food prepared for the king before it was offered to him. This was **royal clinical research** to find out if the food was poisoned.

- Roman physician celsus (1st century A.D.) Who wrote that **using criminals as subjects for dangerous experiments was justified if it would benefit many other innocents**

PRE WAR

- Doctors explored their own bodies to advance clinical knowledge
- John hunter
- Werner Forssmann
- Barry Marshall
- Edward Jenner

- Eugenics

BIRTH OF MODERN ETHICS

- Using others for clinical research

- During the Nuremberg **War Crimes** Trials(1945-49), 23 German doctors were charged with crimes against humanity for performing medical experiments upon concentration camp inmates and other living human subjects, without their consent


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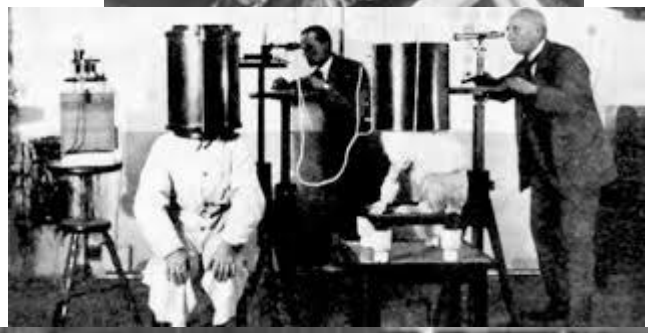

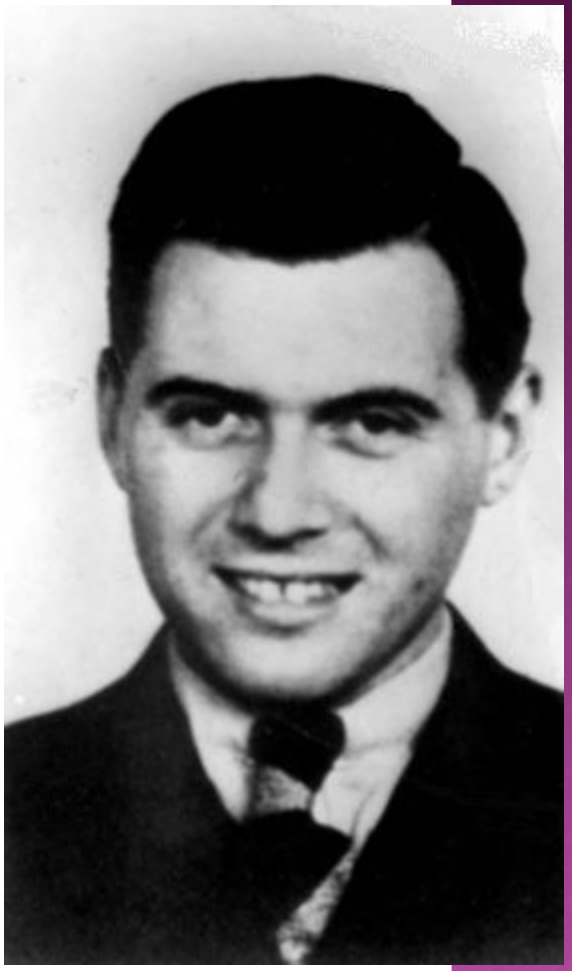

THE NUREMBERG CODE (1947)

As part of the verdict, the Court enumerated some rules for "Permissible Medical Experiments", now known as the “Nuremberg Code”. These rules include:

- **Voluntary consent**
- **Benefits outweigh risk**
- **Ability of the subject to terminate participation**

- foundation for subsequent ethics codes and federal research regulations

DECLARATION OF GENEVA

- Physician's Oath- was adopted by the General Assembly of the World Medical Association at Geneva in 1948
- It is a declaration of a physician's dedication to the humanitarian goals of medicine, a declaration that was especially important in view of the medical crimes which had just been committed in Nazi Germany

UNETHICAL HUMAN EXPERIMENTATION IN THE UNITED STATES

- Surgical experiments
- Pathogens, disease, and biological warfare agents
- Human radiation experiments
- Chemical experiments-operation top hat
- Psychological and torture experiments
- Operation whitecoat

- 1950s- Willobrook Hepatitis study,

- Thalidomide disaster
- 1960s- Jewish chronic disease hospital study
- 1970s- San antonio cotraception study

- 1932-1972-tuskegee syphilis study
- States public heath department

- National research act 1974
  - Established the “National Commission for the Protection of Human Subjects of Biomedical and Behavioral Research”
  - Required IRBs at institutions receiving HEW support for human subjects research

DECLARATION OF HELSINKI(1964)

- **Recommendations guiding medical doctors in biomedical research involving human subjects**
- Developed for the medical community by the world medical association
- It is not a legally binding instrument under the international law

- **Issues addressed in the Declaration of Helsinki include:**
- Research with humans should be based on laboratory and animal experimentation
- Research protocols should be reviewed by an independent committee
- Informed consent is necessary
- Research should be conducted by medically/scientifically qualified individuals
- Risks should not exceed benefits

THE BELMONT REPORT (1978)

Basic Ethical Principles:

- Respect for Persons
  - Individual autonomy
  - Protection of individuals with reduced autonomy
- Beneficence
  - Maximize benefits and minimize harms
- Justice
  - Equitable distribution of research costs and benefits

- 1982- World Health Organisation (WHO) and the CIOMS – **Proposed International Guidelines for Biomedical Research involving Human Subjects**

INDIAN GUIDELINES

- 1980- Policy Statement on Ethical Considerations involved in Research on Human Subjects

- 2000- Ethical guidelines for Biomedical Research on Human Subjects

INDIAN EXPERIENCE

- Institute for Cytology and Preventive Oncology in New Delhi- 1158 women patients of different stages of cervical dysplasia or precancerous lesions of the cervix. These patients were left untreated to see how many lesions progressed
- 71 women-developed malignancies
- 9 women-invasive carcinoma
- 62 women-treated only after they developed localised cancer

HUMAN PAPILLOMA VIRUS (HPV) VACCINE TRIAL

- It was conducted on nearly 23,500 girls in the 10-14 years age group
- In andhra pradesh, nearly 2,800 consent forms were signed by a hostel warden or headmaster, as the ‘guardian'.
- Trial came under scrutiny following a public outcry over the death of seven children.

NOT ONLY TRIALS, WHAT ABOUT ETHICS IN EVERYDAY PRACTICE?

- Indian parliamentary committee in **its report on the CDSCO** noted: ‘There is sufficient evidence on record to conclude that there is collusive nexus between drug manufacturers, some functionaries of CDSCO and some medical experts.’ The committee also pointed out that the CDSCO had approved 33 drugs, out of a randomly selected sample of 42, **without clinical trials on Indian patients.**

- From 2005 to 2012, about 475 new chemical entities were tested, only 17 were approved for marketing.
- As many as 57,303 patients were enrolled in clinical trials but only 39,022 completed them – 11,972 patients suffered serious adverse effects 2644 died. Out of these, 80 deaths have been linked to clinical trials. However, in only 40 out of 80 instances where the trial participant died has their family been compensated.

ETHICAL GUIDELINES FOR BIOMEDICAL RESEARCH ON HUMAN PARTICIPANTSPRINCIPLES TO BE FOLLOWED

- General principles
- Principle of essentiality
- Principle of voluntariness, informed consent
- Principle of non-exploitation
- Principle of privacy and confidentiality

- Principles of precaution and risk minimisation
- Principles of professional competence
- Principles of accountability and transparency
- Principles of the maximisation of the public interest and of distributive justice

- Principles of institutional arrangements
- Principles of public domain
- Principles of totality of responsibility
- Principles of compliance

ETHICS COMMITTEE

- First appearance of need of ethics committee (EC) was made in declaration of helsinki in 1964-in india it appeared in 1980
- Sponsor and / or investigator should seek the opinion of an independent *ethics committee regarding suitability of the protocol*
- Basic responsibility of EC is to ensure an independent, competent and timely review-safeguard the dignity, rights, safety and well-being of participants

- IEC should be multidisciplinary and multi-sectorial
- Number of persons in an ethical committee be kept fairly small (5-7 members)
- Chairperson of the committee should preferably be from outside member
- Secretary who generally belongs to the same institution should conduct the business of the committee

- The composition may be as follows :-
- 1. Chairperson
- 2. 1-2 basic medical scientists (preferably one pharmacologists).
- 3. 1-2 clinicians from various Institutes
- 4. One legal expert or retired judge
- 5. One social scientist / representative of non-governmental voluntary agency
- 6. One philosopher / ethicist
- 7. One lay person from the community
- 8. Member Secretary

REVIEW PROCEDURE

- Scientific review first followed by ethical review
- Evaluate risk with proper justification
- All proposals will be scrutinised to decide under which of the following three categories it will be considered
- Exemption from review
- Expedited Review
- Full Review

THAN YOU