TYPES OF ETHICAL FRAMEWORK SUMMARY NOTES

Title: Ethical Frameworks in AI

Definition

An **ethical framework** is a system of principles and guidelines that helps individuals or organizations determine what is **right or wrong** and guides them in **moral decision-making** and **ethical actions**.

- Relevance to AI
 - Al affects many spheres of life: medicine, business, climate, manufacturing, etc.
 - While AI is useful, it can also make mistakes, be unfair, or harm people.
 - Thus, ethical rules are necessary to ensure AI acts fairly, safely, and helpfully.

What Are Ethical Frameworks of AI?

The rules around the use of ethics in AI decision-making are called ethical frameworks of AI.

AI Ethics and Ethical Principles of AI

- Al Ethics
 - A set of rules and guidelines.
 - Ensures AI acts in a good, fair, and legal manner.
 - Al should:
 - **Help** people, not harm them.
 - Be **clear** and follow **laws**.

• Key Ethical Principles

- 1. AI should respect human rights.
- 2. AI should be **fair and safe**.
- 3. AI should not replace humans in important decisions.

***** Note (Highlighted)

The rules built around the use of ethics in AI decision-making are known as ethical frameworks of AI.

1. Consequentialism Framework

- Definition:
 - Morality of an action is based on its consequences.

- The right action is the one that produces the most happiness or least harm for the greatest number of people.
- Consequentialist AI ensures:
 - AI actions maximize positive results and minimize harm.
 - A self-driving car should choose the less harmful option during an accident.
 - Governments may impose lockdowns via AI to protect public health.
- Examples of Consequentialism in AI:
 - AI in finance to prevent market crashes.
 - AI in healthcare to allocate resources and save lives.
 - AI in traffic systems to reduce accidents and optimize fuel use.

2. Utilitarianism Framework

(A subtype of Consequentialism)

- Definition:
 - Actions are ethical if they maximize overall happiness or well-being for the greatest number.
 - Moral value depends on consequences.
- Utilitarian AI ensures:
 - AI decisions should benefit the most people.
 - AI should prioritize treatments that help the most patients.
 - Governments can use AI for universal healthcare systems.
- Examples of Utilitarianism in AI:
 - AI for environmental impact reduction through sustainability.
 - AI in education, prioritizing programs benefiting most students.
 - AI in productivity, improving output while reducing economic disruptions.

3. Deontological Ethics Framework (Duty-Based Ethics)

- Based on rules, duties, and obligations, not outcomes.
- Ensures AI:
 - Does not harm humans.
 - Acts with honesty, fairness, and truthfulness.
- AI should **not discriminate** and must follow **anti-discrimination laws**.
- AI systems must **respect privacy** and **human rights**.

• Examples of Applications:

- AI in healthcare, applying equal rules regardless of background.
- AI in hiring, ensuring fair treatment and avoiding bias.

4. Virtue Ethics Framework

- Focuses on virtues (character traits) like honesty, kindness, empathy, courage, and fairness.
- Encourages ethical character, not just rule-following.

• Virtue Ethics ensures:

- AI should act with honesty, kindness, and empathy.
- AI should be **polite and respectful**.
- Should reflect human values like trustworthiness.

• Examples of Applications:

- AI that **communicates with empathy**.
- AI systems that **prevent fake news**.
- AI in **business** acting ethically, not just for profit.

5. Human-Centered AI Framework

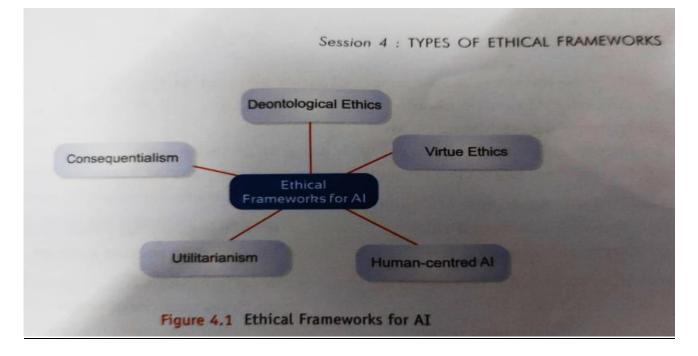
- Emphasizes human values, needs, and empathy.
- Less focused on abstract rules or consequences.

Human-centered AI ensures:

- AI must **help** and **respect** humans.
- AI should work with humans, not replace them.
- AI should reflect **human interests** and **values**.

• Examples of Applications:

- AI in workplaces, supporting human tasks.
- AI in healthcare, helping with better decisions.
- AI in governance, ensuring transparency and inclusion.



LET US REVISE

- An ethical framework refers to a system of principles and guidelines that helps individuals or organizations determine what is right and wrong, guiding them in making moral decisions and taking ethical actions.
- As per the Deontological Ethics framework, actions are considered ethical if they follow a set of established rules or duties, regardless of the outcome.
- Consequentialism framework emphasizes on the consequences of actions, i.e., an action is deemed ethical based on the outcomes it produces.
- As per the Utilitarianism framework, the actions are ethical if they maximize overall happiness or well-being for the greatest number of people.
- Virtue ethics framework emphasizes on character and moral virtues of an individual.
- Human-centered AI frameworks emphasize human values, need, and empathy rather than abstract rules or general consequences.