

PROBLEM & PROBLEM UNDERSTANDING

Social or business impact:

DATE	21.10.2023
TEAM ID	NM2023TMID08532
PROJECT NAME	DRUG TRACEABILITY
REMARKS	

Social Impact:

Patient Safety: Drug traceability systems help ensure the authenticity and safety of pharmaceutical products. This can prevent patients from receiving counterfeit or substandard drugs, which could have harmful consequences.

Public Health: Traceability systems can track the distribution of medications, enabling rapid responses in case of recalls or identifying the source of contaminated or unsafe drugs. This contributes to overall public health.

Counterfeit Drug Reduction: Traceability can reduce the prevalence of counterfeit drugs in the market, protecting consumers from potentially life-threatening consequences.

Trust and Confidence: When patients and healthcare providers have confidence in the authenticity of drugs, it can improve trust in the healthcare system and pharmaceutical industry.

Cost Implications: The implementation of drug traceability systems may lead to increased costs, which can affect drug pricing and accessibility, potentially impacting social equity.

Regulatory Compliance: Drug traceability is often mandated by governments to ensure regulatory compliance. Non-compliance can have legal and financial consequences for manufacturers and distributors.

Data Privacy and Security: The collection and storage of data in traceability systems may raise concerns about patient privacy and data security.

Business Impact:

Positive Business Impacts:

Compliance with Regulations: Meeting traceability requirements imposed by regulatory bodies is essential. Non-compliance can result in legal penalties, loss of licenses, and damage to a company's reputation.

Enhanced Supply Chain Visibility: Drug traceability systems provide better visibility into the supply chain, allowing businesses to optimize inventory management, reduce losses from counterfeit drugs, and minimize the risk of recalls.

Improved Product Quality: Traceability systems help identify and address quality issues in real-time, which can lead to improved product quality and reduced waste.

Increased Consumer Trust: Implementing robust traceability systems can boost consumer trust in a brand, as it demonstrates a commitment to product safety and authenticity.

Competitive Advantage: Businesses that embrace traceability early on can gain a competitive advantage by differentiating themselves in the market as leaders in product safety and quality.

Challenging Business Impacts:

Implementation Costs: Establishing traceability systems can be costly, including expenses for technology, infrastructure, and staff training.

Operational Changes: Businesses may need to restructure their operations and invest in new technology, which can be disruptive and time-consuming.

Data Management: Handling large volumes of traceability data requires effective data management and security, which can be a complex and ongoing challenge.

Potential for Disruption: The transition to traceability systems can disrupt existing processes and supply chain relationships, requiring careful planning and management.

Concerns about Privacy: Collecting and managing traceability data may raise privacy concerns, which could lead to legal and reputational risks if not properly addressed.