



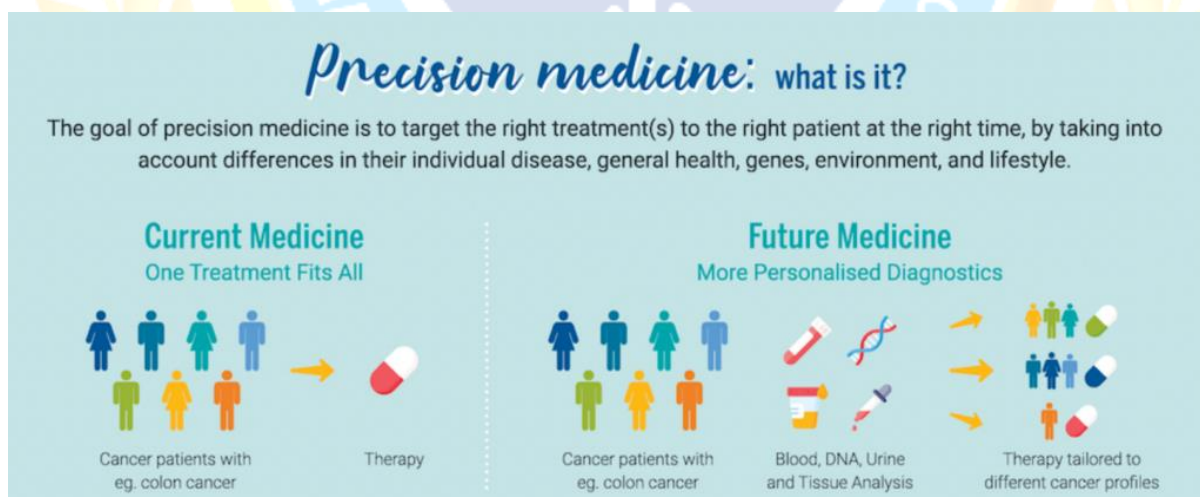
BIO BANKS : SCIENCE & TECHNOLOGY

NEWS : Why precision medicine in India can't advance without biobank laws

WHAT'S IN THE NEWS ?

Precision medicine is bringing in a new era of [personalised healthcare](#). The field began to take concrete shape when scientists were wrapping up the Human Genome Project. Since then, genomics has played a major role in the diagnosis and treatment of various cancers, chronic diseases, and immunological, cardiovascular, and liver diseases.

- **Precision Medicine:** Personalized healthcare, focusing on cancer, chronic diseases, and genetic disorders.
- **Technological Advancements:** Gene editing, mRNA therapeutics, and organ-on-chips are transforming diagnostics and treatments.
- **India's Precision Medicine Market:** Growing at 16% CAGR, projected to exceed \$5 billion by 2030.
- **Biobanks:** Essential for storing biological samples, enabling research into rare genetic disorders and potential therapies.
- **Biobanks in India:** 19 biobanks exist, supporting projects like Genome India and PRaGeD for genetic disorder research.
- **Challenges in Biobanking Regulations:** Fragmented laws in India concerning informed consent, data protection, and ethical use of samples.
- **Need for Regulatory Reform:** Stronger, globally-aligned biobanking laws are crucial for ethical practices and international collaboration.



Source: <https://www.thehindu.com/sci-tech/science/precision-medicine-india-barriers-biobank-diversity-data-protection/article68748285.ece>