Engineering Resilience: Regenerative Medicine Research at TEC and Across Latin America

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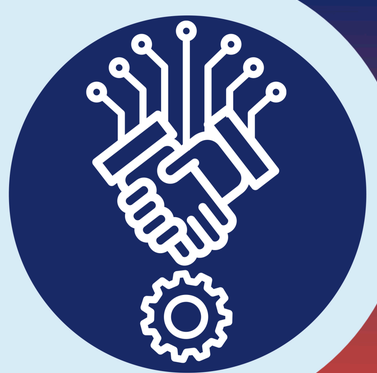
Regenerative medicine research in Latin America faces limitations in infrastructure, resources, and access to advanced technologies. These challenges have driven innovation through local biomaterials, adapted technologies, and regional collaboration.

Regional Challenges



- Limited infrastructure
- High cost of biomaterials and equipment
- Limited access to advanced technologies
- Barriers to knowledge exchange
- Essential need of a robust, non-restrictive, and updated regulatory framework

Innovation and Solutions



- Development of biomaterials from local sources
- Adaptation of existing technologies
- Creation of collaborative research networks
- Low-cost tissue engineering approaches

Current Achievements



- Tissue banks
- Skin tissue engineering therapies
- Drug discovery models
- Collaborative research initiatives

TEC Contribution



- Responds to local needs
- Has global impact
- Encourages South-South collaboration
- Promotes equitable knowledge exchange

Conclusion

Scientific innovation in Latin America is driven by resilience, collaboration, and creativity. Integrating research advancements into graduate and undergraduate curricula ensures academic programs remain relevant.
By transforming limitations into opportunities, regional institutions are advancing regenerative medicine and strengthening scientific sovereignty.