Tens of thousands of US bridges and buildings, many over 50 years old, need repairs or are at risk of failure due to antiquated technology and materials. Fiber-reinforced polymer (FRP) composite rods have high strength-to-weight ratios and resist corrosion, but as yet have not been used widely in post-tensioning or in pre-stressing applications. Standard gripping anchors, when used with FRP rods used to repair infrastructure, place stress on individual fibers, leading to premature failures. The proposed technology is an inexpensive anchor, splicing, and pre-stressing device for FRP rods. The device is simple to build and uses conventional materials such as steel and epoxy to achieve pre-stressing of FRP rods of any length. It makes FRP rods a more viable option for construction, significantly reducing costs and adding a successful FRP anchor for post-tensioning and pre-stressing applications.

**TECHNOLOGY SUMMARY**


**FEATURES AND BENEFITS**

- Facilitates the use of FRP rods in infrastructure rehabilitation.
- Reduces the likelihood of structural failures.
- Decreases the costs of structural repairs.

**RECENT PUBLICATIONS**


**INVENTOR PROFILE**

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