

TENSOREX C+

PATENTED SPRING AUTOMATIC
TENSIONING SYSTEM



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RAILWAY

WHY CHOOSE TENSOREX C+

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TENSOREX C+ is significantly more compact than conventional tensioning devices, and can be fitted in about an hour.



Key Advantages

- High precision of performance
- Greater reliability in operation
- Health and safety risks reduced
- Easy to install
- Compact and lightweight
- Low maintenance
- Reduced risk of vandalism / theft
- Low impact aesthetics
- Suitable for tunnels / areas of limited space
- Mounting solutions available for all applications
- Reusable in the event of wire failures

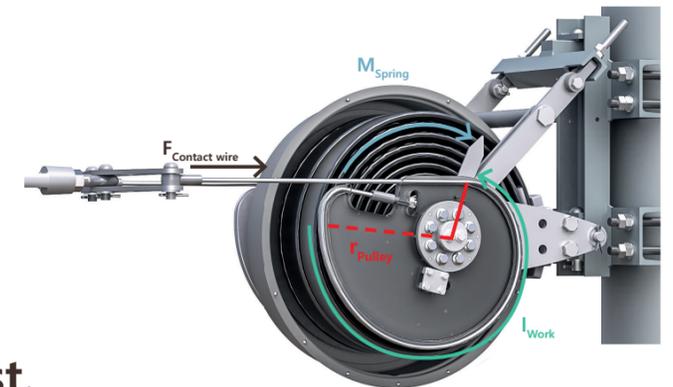
Tensorex C+ facts

- Units Sold: 25,000+ (Asia, Africa, Australasia, Europe, North and South America)
- Compensating Length: 450-1100 mm
- Line Tension Force: 7.5-40 kN

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How it works

By means of a support cable, TENSOREX C+ exerts a constant tension on the contact wire, regardless of any changes in length due to temperature. The special spiral spring is firmly connected to two cams on the same shaft. The degree of rotation of the shaft results in a linear variable torque/moment, which is compensated for by the combination with the variable radius of the cam. This produces a constant pulling force over the entire device working range.



$$F_{\text{Contact wire}} = \left(f \frac{M}{r} \right) = \text{const.}$$

- F_{Contact wire}** -> Force on contact line
- M_{Spring}** -> Torque/moment applied by spring
- r_{Pulley}** -> Radius of cam (variable)
- l_{Work}** -> Device working range correspond to variable pulley profile length