AXIAL DYNAMICS

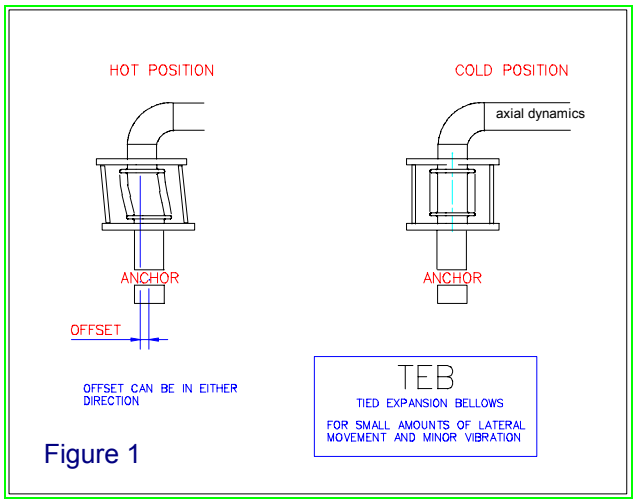

Figure 1

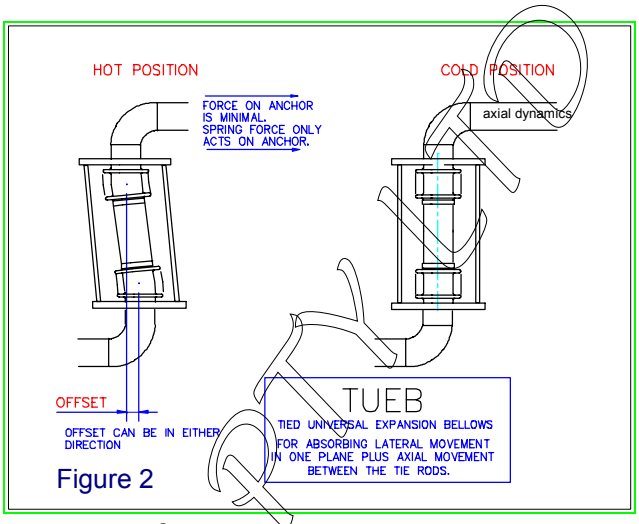

Figure 2

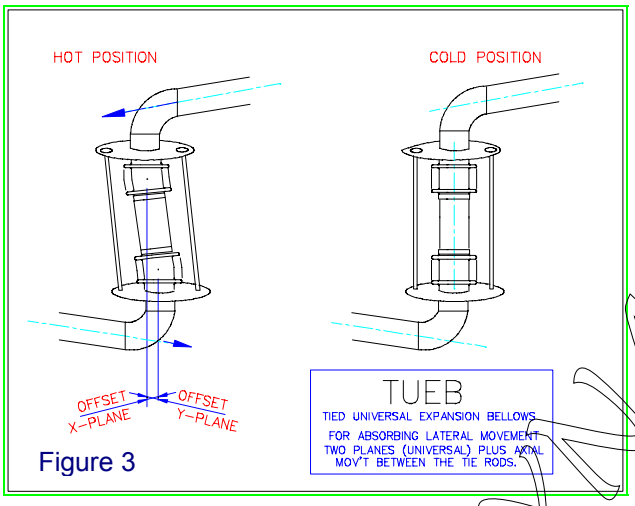

Figure 3

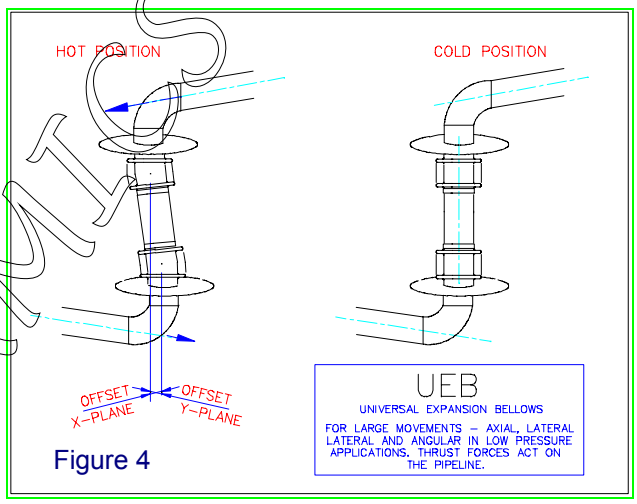

Figure 4

The *AXIAL DYNAMICS* **TUEB** - Tied Universal Expansion Bellows - is well suited to allow lateral deflection in the low to medium pressure range. Used in this manner the tie rods will restrain the pressure thrust preventing forces being transmitted onto anchors or adjacent equipment.

Figure 1 shows the Axial Dynamics **TEB** - Tied Expansion Bellows. It is well suited to allow small amounts of lateral deflection and vibration. Axial Dynamics Tied assemblies do not transmit pressure thrust loads onto the pipeline.

Fig.2 shows a **TUEB** used to absorb lateral deflection in a single plane. Wherever feasible the Axial Dynamics expansion joint should be designed to fill the entire leg so that the expansion of this leg is absorbed within the tie rods as axial movement.

Fig.3 shows a **TUEB** used to absorb lateral deflection in a two plane configuration. As the Axial Dynamics expansion joint will absorb lateral deflection in any direction, the two horizontal piping legs may lay at any angle in the horizontal plane.

Fig.4 shows an Axial Dynamics **UEB** - Universal Expansion Bellows used to absorb lateral deflection in a two plane configuration. *AXIAL DYNAMICS* UEB assemblies are for low pressure applications up to 200 KPa depending on the diameter.