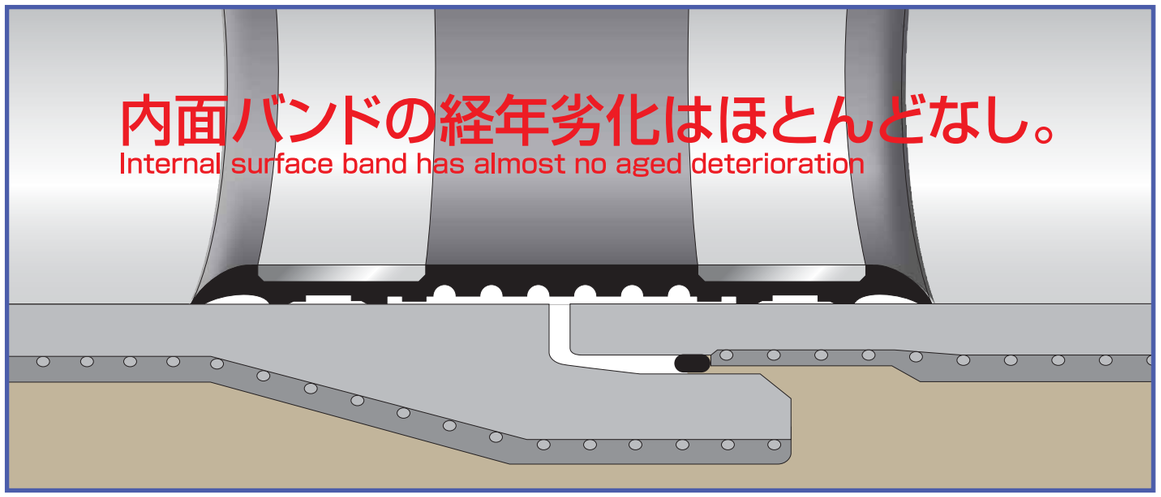
管継手は水圧と共生する内 面バンドで再生・保全

Rehabilitate and maintain pipe joints with water pressure cautious Internal Band

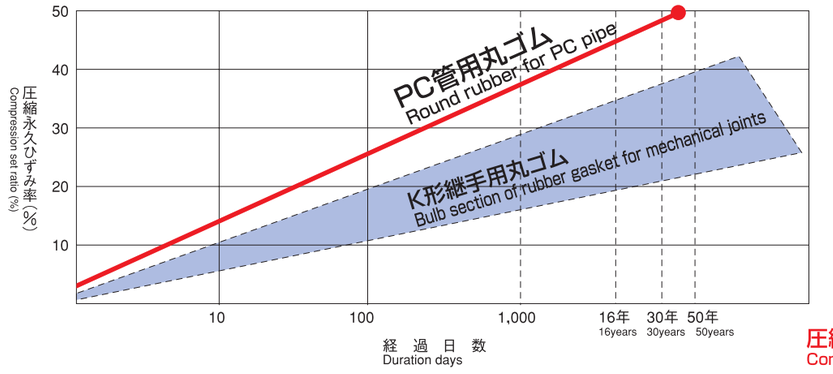


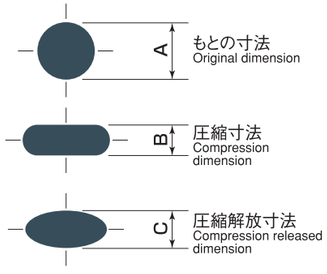
管継手ゴムは経年劣化で止水能力低下し漏水原因

Aging of pipe joint rubber declines watertightness and causes water leakage

K形継手用丸ゴム部とPC管用丸ゴムの圧縮永久ひずみ率と経過日数との関係（材質SBR）

Relation between compression set ratio and duration period of bulb section of rubber gasket for mechanical joints and round rubber for PC pipe (Material, SBR)



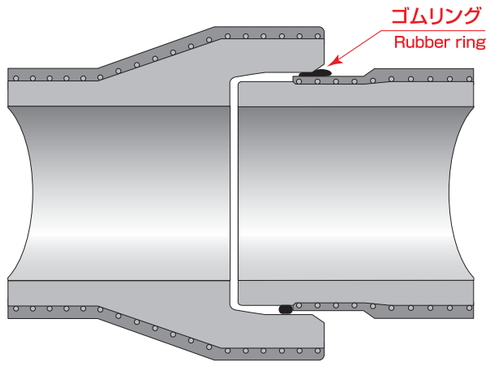


圧縮永久ひずみ率= $\frac{A-C}{A-B}$ ×100

Compression set ratio

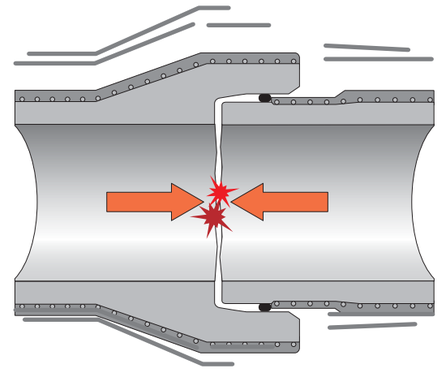
ゴム反力低下で水圧によりゴムリング飛び出し漏水

With decline of rubber reaction, rubber ring is ejected to cause water leakage



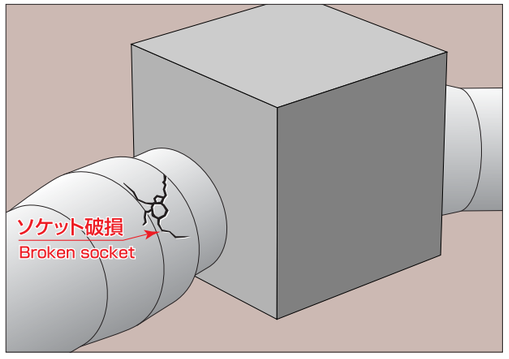
地震時には管継手は衝突の繰り返しで漏水

During the earthquake, pipe joint suffers repeated collision and result in water leakage



地震時には曲管部に集中応力が作用し管破損漏水

During the earthquake, the stress concentration acts at bend pipe area and cause pipe break water leakage



構造物付近の管継手は不等沈下で漏水

Pipe joint near the structure suffers uneven settlement and result in water leakage