



SOLON® FLANGE WASHERS SOLVE GASKETED JOINT LEAKS FOR HEAT EXCHANGERS

INDUSTRY CHALLENGE

A processing plant had a leaking heat exchanger. The heat exchanger's primary fluid, Hexamethalenediamine, was subject to a 500-600°F temperature swing and rapidly developed massive leaks at the gasketed joint. Different gasket materials and bolting techniques were tried, in addition to ultrasonic measuring of the bolts in conjunction with hydraulic bolt tensioning, without success.

SOLUTION

Solon® Flange Washers were recommended and installed using normal assembly techniques which resolved the gasketed joint leak seamlessly.

There are many variables that occur in a typical flange assembly including; differential thermal expansion, tool inaccuracies, plastic deformation of components, or complex elastic interactions. Mathematical reasoning, laboratory experimentation, and field experience indicate that Belleville spring flange washers are an effective method of creating a more reliable flange assembly.

Solon Flange Washers are designed to maintain sufficient bolt tension and resultant gasket pressure in high temperature and high-pressure applications where safety and emission containment take priority.

SOLON ADVANTAGES

- Reduce fugitive emissions
- Maintain bolt integrity
- Maintain leak-free joints
- Made in the USA
- *Comprehensive Risk Analysis* - contact a Solon engineer for a live load design audit

CUSTOMER BENEFITS

- Economical alternative to costly system enhancements
- Low maintenance



Solon® Flange Washers

For more information about the use of Solon Flange Washers, please download our technical white paper, [Why Do Gasketed Joints Leak?](#)



For additional information, please contact Solon Manufacturing Co.
800.323.9717 | sales@solonmfg.com | www.solonmfg.com