

APPARATUS AND METHOD FOR BACKSEATING A GATE VALVE

ABSTRACT

A valve assembly for use in regulating a fracturing fluid that includes an actuating stem for actuating a gate, a balancing stem, and a backseat on the stem that defines a backseat seal when urged against a profile in the valve assembly. The backseat seal is energized by applying a force to an end of the balancing stem. An end of the balancing stem is enclosed within a plenum, so that the force on an end of the balancing stem can be applied by pressurizing the plenum. The assembly can be on an opposite side of the valve body/bonnet to create a backseat seal on a balancing stem/bonnet to allow changing the stem packing on the balance stem side while maintaining pressure integrity.

Figure 1