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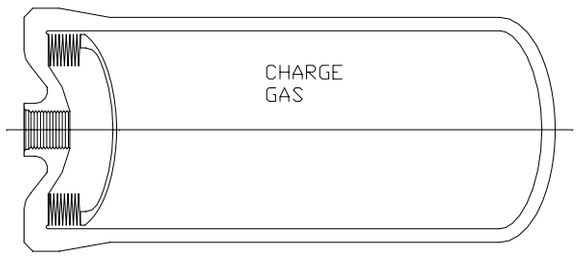
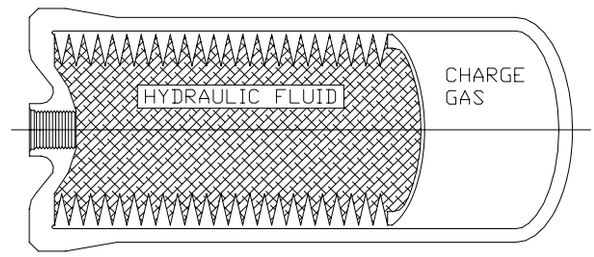
Metal Bellows

HIPRES® Accumulator Design Data Sheet

Contact: _____	**Company:** _____
Phone: _____	**Email:** _____

In order to properly size the accumulator we must understand what displaced fluid volume is required from what high pressure to what low pressure and over what temperature range.

Accumulator Empty Condition	**Accumulator Full Condition**
	
Fluid Pressure [PSIG] / [bar] _____	**Fluid Pressure [PSIG] / [bar]** _____
Fluid Temperature [F] / [C] _____	**Fluid Temperature [F] / [C]** _____
Fluid Volume [IN^3] / [Liters] _____	**Fluid Volume [IN^3] / [Liters]** _____
This will be 0 unless you wish some fluid remaining in the accumulator	

For the pressure vessel design we must understand proof and burst pressure requirements. Standard values are described below but the customer may allow for different values to suit specific applications. Further, we need to understand at what temperatures these pressures are to be measured. Standard temperature of 68F is typical.

From ARP4378:

Proof pressure = 1.5 × maximum operating pressure or 3 × precharge pressure (whichever is higher)

Burst pressure = 4 × maximum operating pressure or 5 × precharge pressure (whichever is higher)

Burst Pressure [PSIG] / [bar] _____ **At what Temperature [F] / [C]** _____

Proof Pressure [PSIG] / [bar] _____ **At what Temperature [F] / [C]** _____

Envelope Constraints

Maximum Diameter [IN] / [CM] _____

Maximum Length [IN] / [CM] _____

Miscellaneous

Hydraulic port requirement _____

Fluid type _____

Target Weight [LBS] / [Kg] _____

Pressure indicator required? ○ No ○ YES **What type** _____

Fill Rate [IN^3/Min] / [L/M] _____

Empty Rate[IN^3/Min] / [L/M] _____

Number of fill/empty cycles _____

Application description _____

_____

Submit Design Requirements