



(1) Minimum operating equipment for the preventers and hydraulically operated valves shall be as follows: (1) Multiple pumps, driven by a continuous source of power, capable of fluid charging the total accumulator volume from the nitrogen precharge pressure to its rated pressure within _____ minutes. Also, the pumps are to be connected to the nitrogen precharge of nitrogen of not less than 750 PSI and connected so to receive the aforementioned fluid charge. With this it must be sufficient to close all the pressure-operated devices simultaneously within _____ seconds, after closure, the accumulator fluid volume at least _____ percent of the original. (3) When requested, an additional source of _____ g accumulator pumps operated by separate power and equal in performance capabilities.

The closing manifold and remote closing manifold shall have a separate control for each pressure-operated device. Controls are to be labeled, with control handles indicating open and closed positions. A pressure reducer and regulator must be provided for operating the Hydril preventer. When requested, a second pressure reducer shall be available to limit operating fluid pressures to ram preventers. Gulf Leasing No. 38 hydraulic oil, an equivalent or better, is to be used as the fluid to operate the hydraulic equipment.

***To include derrick floor mounted controls.**