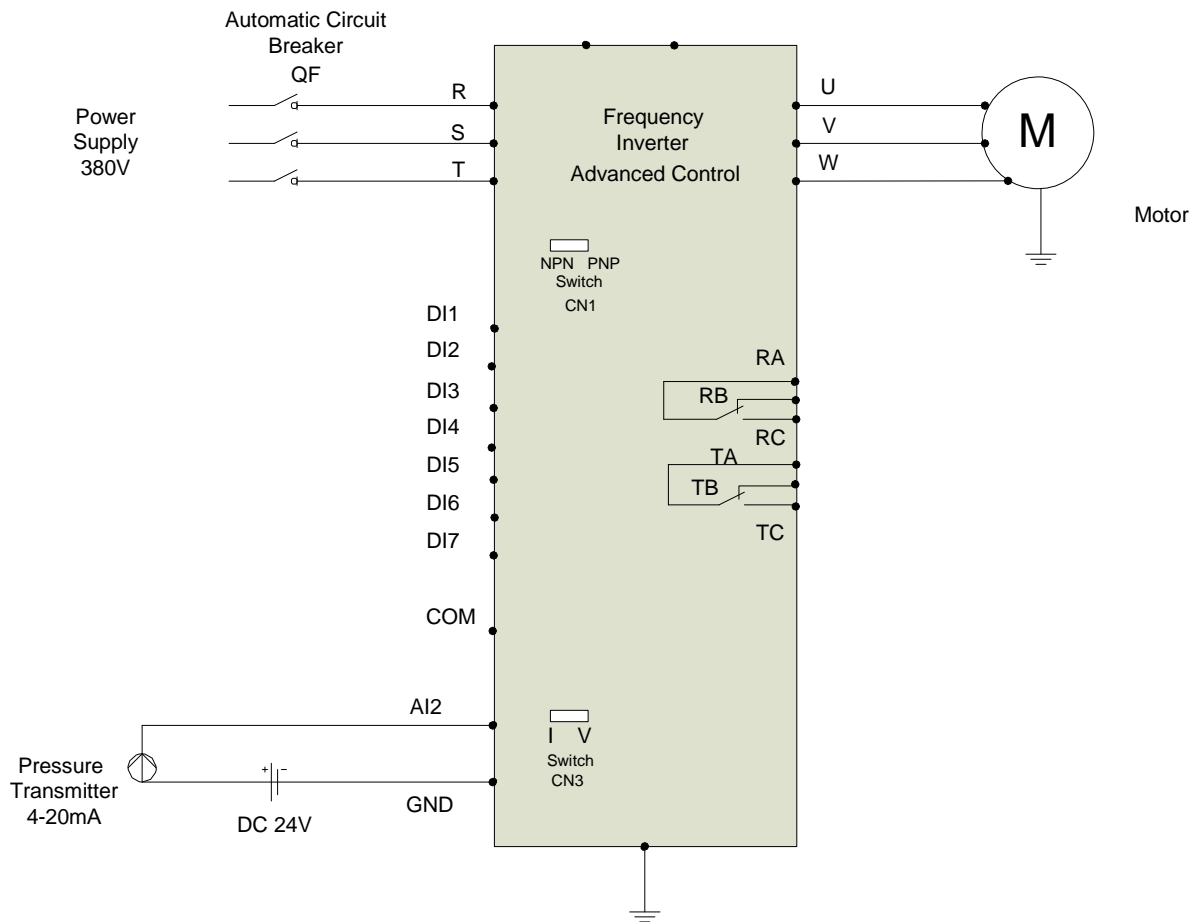


Pump application example of frequency inverter M420 series with PID control



M420 series PID control algorithm

F4-01 Motor rated power

F4-04 Motor rated current

F4-06 Motor rated speed

F0-01=1

F0-03=2

F0-04=0

F0-06=6

F2-00=2

F5-20=2.00

F7-29=2049 indication: rated speed and maintained frequency (switch with «SHIFT»)

F7-30=257

FA-00=0

FA-01= (--60--) % maintained pressure value in water supply system

FA-03=1 connect pressure transmitter (4-20mA) to terminal «AI2». Switch CN3 to I (left)

FA-05= (--100--) upper limit of the display scale of pressure transmitter measurement

FA-06=60 Proportional gain P

FA-07=0.5 Integration time I

FA-13=1.0 Protection from communication circuit fault of pressure transmitter (Err29)

FA-14= Response delay of protection from communication circuit fault

F0-18=25 Lower frequency (Hibernating input)

F7-17=1

F7-19=30s Delay time for restart

F7-37=1

F7-38=3% Wake up pressure difference

F1-19=2 Restart after power failure

F1-20=1s

F1-21=1s