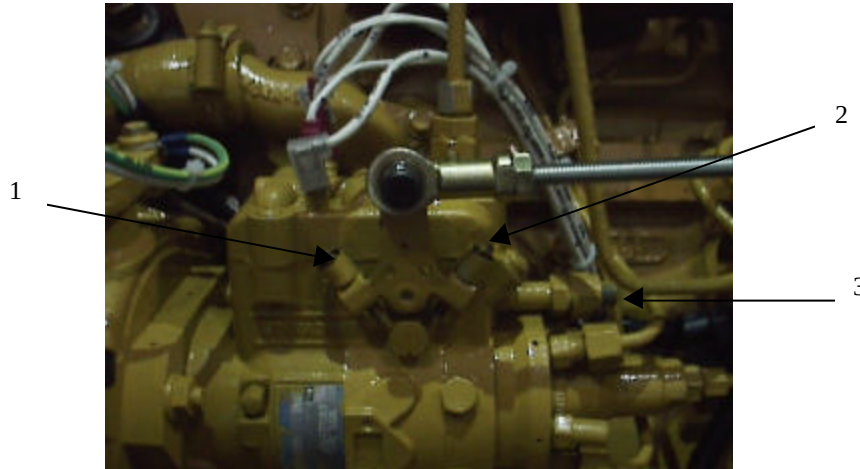


## Electronic Governor Set up procedure for XQ30P2 Models

1. Using special tool part number 995-227 adjust the low and high speed stop screws (items 1 and 2 respectively in photograph) so that the throttle arm on the fuel pump is locked in the vertical position.
2. Disconnect the governor actuator rod from the throttle arm on the fuel pump and the governor actuator arm.
3. Ensure that the droop screw (item 3 in photograph) is set to the correct position for the rated speed (6-7 turns in for 60 Hz). That is, turn the droop screw counter-clockwise until it stops, then turn in 6 to 7 full turns.



4. Start the engine.
5. Adjust the high speed stop screw on the speed arm to give 3 to 4 Hz above rated speed when the arm is held against the stop at no load.
6. Adjust the low speed stop screw on the speed arm to give 4 to 5 Hz below rated speed when the arm is held against the this stop at no load. **Note: Take care not to unscrew the low speed screw too far, since the control linkage in the fuel pump will be damaged if the speed is less than 1250 rpm.**
7. Stop the engine.
8. Replace the governor actuator arm with the new straight arm (part number 171-021).
9. Reconnect the electronic governor actuator rod to the speed arm on the fuel pump.
10. Connect the actuator rod to the top hole (nearest the actuator) of the actuator arm.
11. Check that the actuator will allow the speed arm on the fuel pump to reach the adjustment stops on the fuel pump. If this is not the case, adjust the length of the actuator rod.
12. Start the engine and set the rated speed on the electronic governor to the rated speed.
13. Adjust the gain and stability on the electronic governor until the engine speed is stable at no load
14. The rated speed, gain and stability adjustments may need a number of iterations to give stable operation.
15. Stop the engine.

16. Restart the engine and observe the amount of speed overshoot is acceptable.
17. Adjustments to gain and stability may be required to get the best combination of start up overshoot and stable speed.
18. Check that the system is now stable by momentarily pushing the speed arm towards the low speed stop and releasing. The speed should settle back to rated with minimum oscillation. If the speed stability is not satisfactory, further adjustments of the gain and stability will be necessary.