Before Installation of your new EPC completely read this document.

Revision Notice:

The legacy EPC1 and EPC2 (EPC 100 series) have been replaced by the EPC3 (EPC 300 series).

EPC Software Notice:

Before installing this EPC amplifier, you must have the current version of the PC Configuration Software. If using an older software version to configure or download previous software configurations to an EPC you may lose control of the device you are controlling! That could result in damage to the equipment and/or personal injury.

The **Oilgear USB stick** contains revised documents and the new EPC PC interface for Windows. Previous versions of the PC Interface will NOT work with the current EPC3, but the new interface should be backwards compatible to communicate to EPC1 and EPC2 units.

Wiring Changes:

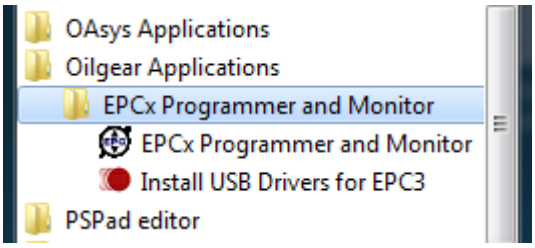
The wiring for the new EPC3 is similar, in that every pin on the legacy EPC1 and EPC2 is also on the EPC3, although the pin designation has changed. Please reference the label on the right-hand side of the module or the chart at the end of this guide:

For example J1-1, +24VDC, corresponds to the old style pin (1). J1-2, GND, corresponds to the older style pin (2).

The new pins are configured to match the location of the old style – i.e. legacy pins 1-8 route to J1-J3, which are located on the top of the module, while legacy pins 11-20 route to J4-J6, which are located on the bottom of the module.

USB Driver Installation:

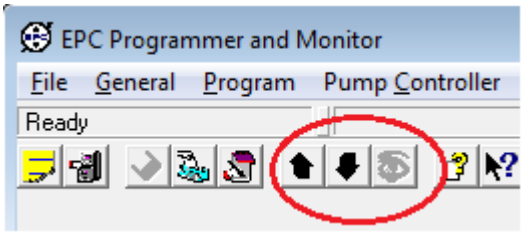
The current PC interface is installed under “Oilgear Applications” while the older PC interfaces were installed under OAsys Applications. If you are upgrading from older software both start menu groups may appear in the list. The link to “Install USB Drivers for EPC3” however will only appear under the “Oilgear Applications” menu.



USB Cable Connection:

The EPC must be “off-line” before removing the USB communications cable. Failure to do so may result in a reset of the EPC3 with temporary loss of closed loop control and may lead to equipment damage or personal injury.

On/Offline connection can be toggled by the “eye” button on the EPC3 toolbar below, grey indicates OFFLINE.

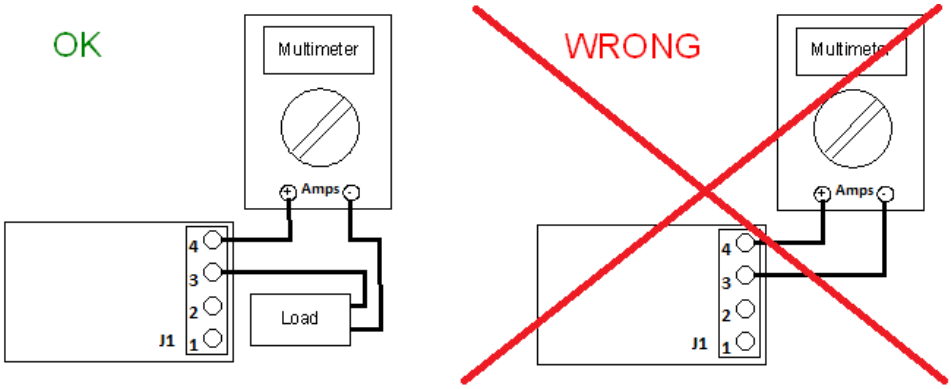


EPC Output Notice:

The EPC valve driver and LVDT oscillator outputs cannot be directly shorted.

Shorting the valve driver outputs terminals J1-3 and J1-4 or LVDT Oscillator terminals J6-3 and J6-4 will result in permanent damage of the EPC device.

The outputs of the EPC can be monitored with the EPC Support Software (for more information refer to the online help in the software). When attempting to measure the current at the output terminals make certain that a load is present in your meter circuit to prevent EPC damage.



Pin No	Type	Description	Legacy EPC2 pin
J1-1	PWR+	24 VDC power supply +	PIN 1
J1-2	GND	Ground	PIN 2
J1-3	O/P	Servo valve command +	PIN 5
J1-4	O/P	Servo valve command -	PIN 6
J2-1	I/P	Digital input +	PIN 3
J2-2	I/P	Digital input -	--
J2-3	O/P	Digital Output +	PIN 4
J2-4	O/P	Digital Output -	--
J3-1	O/P	Programmable Analog output 1 +	--
J3-2	O/P	Programmable Analog output 1 -	--
J3-3	O/P	Programmable Analog output 2 +	PIN 7
J3-4	O/P	Programmable Analog output 2 -	PIN 8
J4-1	I/P	Analog input 1 +	PIN 11
J4-2	I/P	Analog input 1 -	PIN 12
J4-3	I/P	Analog input 2 +	PIN 13
J4-4	I/P	Analog input 2 -	PIN 14
J5-1	I/P	Analog input 3 +	PIN 15
J5-2	I/P	Analogue input 3 -	PIN 16
J5-3	O/P	24VDC Analog supply -	--
J5-4	O/P	24VDC Analog supply +	--
J6-1	I/P	LVDT feedback +	PIN 17
J6-2	I/P	LVDT feedback -	PIN 18
J6-3	O/P	LVDT excitation sinusoidal signal	PIN 19
J6-4	O/P	LVDT excitation sinusoidal signal	PIN 20