Inside SeaSonde

What do those Blinking Lights mean anyways.
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The lights on the receiver and transmitter panels are minimal diagnostic to show that the SeaSonde is powered and basic checks are OK.

On AWG III Receivers: (Newer receivers. Many have GPS unit)

At power on, Green, Yellow, Red are all on and should quickly change state probably faster than you can see. If they stay on, it may mean that the AWGIII module is not working or it cannot communicate with the Front Panel board, or possibly the Front Panel board is no longer working.

Green light will flash when the AWGIII module is going through its power up cycle. It will turn to a steady on when the AWGIII is up and running.

Yellow light will flash whenever the computer is communicating with the receiver over the USB line. This communication happens when the computer recognizes that there is a USB device, and when SeaSondeController or SeaSondeAcquisition are talking to the receiver. Since SeaSondeAcquisition is continuously taking data from the receiver, the yellow should continuously blink. If SeaSondeAcquisition is not running, then SeaSondeController will cause the yellow light to blink a few times when it checks the receiver status which is typically once a minute. If neither SeaSondeAcquisition or SeaSondeController are running, then the yellow light will mostly stay off.

Red light will flash when the +5VDC supply is below 4.7V.
Red light will also flash, on DC Powered Receivers, when the +5VDC is low or the DC Supply is low. When the DC Supply falls below 20.4V the Front Panel board will turn off power internally to the receiver and transmitter. When the DC Supply rises over 22.5V, it will turn power back on internally to the receiver. While receiver internal power is turned off, SeaSondeController and SeaSondeAcquisition, will be unable to communicate with the receiver.

The Red light will be solid on, when the receiver power up failed or the watchdog was tripped and is restarting the receiver (the red light should turn off within in 30 seconds).

On AWG II Receivers:

Green light is always on when power is applied and the +5VDC supply is working.

Yellow will flash when the computer is communicating with the receiver over the USB

line. This communication happens when the computer recognizes that there is a USB device, and when SeaSondeController or SeaSondeAcquisition talk to the receiver.

Red light will turn on when the receiver's data buffer is full. This happens when SeaSondeAcquisition is not running or is not fast enough to keep up with data. When not fast enough, you might see the light turn on only for a short period. If SeaSondeAcquisition is not running and the red light does not turn on after about 30 seconds, then the receiver probably needs to be repaired.

On Transmitters with one Light:

Green light is on when the Transmitter is powered on and its +28VDC supply is working.

On Transmitters with three Lights:

At power on, Green, Yellow, Red are all on and should quickly change state probably faster than you can see. If they stay on, it may mean that transmitter's Front Panel board is no longer working.

Green light is one when the Transmitter is on and its +28VDC supply is working.

Yellow light shows the state of the transmit control line from the receiver. This signal tells the transmitter when to transmit. In normal SeaSonde operation this line is pulsing with the Blanking interval. The yellow light on the transmitter should normally be blinking. When the Receiver's transmit watch is tripped or the transmit control line is forced off, then the yellow light will be off. Only during testing, when the transmit control is forced on and the transmit watch is not tripped, then the yellow light will be steady on. In field operations

Red light is used to indicate power supply problems. It will start blinking when the +28VDC supply drops below +22V.
Red light will be sloid on when the Front Panel board +5V regulator from the +28V supply drops below +4.7V (This will probably be very uncommon as at this point the Transmitter has probably gone completely off line)