Electronics 101: Choosing The Right Graph

Eric Prey & Mike Webb

To be a competent angler you need a working knowledge of the electronics on board your boat. In this series of articles deep fishing guru and electronics answer man Mike Webb and I will help you select, set up and operate your electronics. Whether you have a basic LCD Display, a color GPS / graph combination with a built in hard drive or something in between, understanding your electronics is critical to your fishing success. In this first installment we will discuss the important factors to consider when choosing a graph and define some of the terminology.

There are several important factors that go into the purchase of a graph; pixel count, peak to peak power, screen size, etc… the following are critical:

- Pixel Count: Basically this is the number of squares that make up the picture you see on the graph, the higher the count the greater the detail. If you plan to fish deep you will need a graph with a minimum of 320v x 480h pixel count.
- Cone Angle: Measured in degrees this will give an idea how wide of an area you are viewing on the bottom. For deep fishing a minimum of 15 degrees is necessary.
- Peak to Peak: This is the amount of watts the graph will put out; it is the total amount of AC current output from the graph's peak positive value to its peak negative value. A peak to peak value of 2500 watts or greater is required for deep fishing.
- Screen size: The larger the screen the greater the detail, most deep fisherman use a 7" diagonal screen.
- Greyline: This is a Lowrance term, simply put it shows items of differing densities with differing shades grey darker grey being the stronger signal (i.e. a rock bottom darker grey than a mud bottom, or a fish laying on the bottom).
- Zoom: Gotta Have It! 2x and 4x zoom allows you to look closer at your bait, the structure or the fish without having to adjust the upper and lower limits of your view.
- Transducer Frequency: The higher the frequency the more detail 200 kHz is used for deep fishing, a 50kHz is used for trolling and deep sea fishing it has a broader view.
- Transducer Type: A skimmer transducer is preferred; it stands off of your trolling motor a little further than a pod style which seems to help limit trolling motor inference.

Of these features Mike Webb feels; "Peak to peak wattage is extremely important, without the power you will never be able to get the detail needed to see your bait and the fish. Zoom is critical as well, you need to be able to zoom in and see the additional detail. Lastly, real time information is a must; many graphs have a delay, look for one that offers a feature like Flashgraph from Lowrance and you won't have an issue."

Most of these features will be listed when you are looking at graphs. If you are unsure ask for help or go to the manufactures website for assistance. Many of the manufacturer websites have a tutorial as well, and that can help you set up and understand your graph. If you already own a graph most of these features can be accessed in the graph's menu.

These are the basic terms and definitions used by the majority of the electronics manufactures. While your graph may use different terms all of the electronics on the market today utilize an LCD screen and similar settings and adjustments. In the next installment of this series we will describe the basic settings and adjustments you will need to properly operate your graph.

Eric Prey is a Professional Angler and Coast Guard Licensed Fishing Guide. Annually Eric competes in over 30 Regional Tournaments, conducts over 150 guided fishing trips and writes over twenty published fishing articles. His knowledge of both techniques and technology make him a trusted source of information regarding fishing techniques and marine electronics