



QUEST

METAL DETECTORS



Q30 SERIES

OPERATING GUIDE

TABLE OF CONTENTS

INTRODUCTION TO THE Q30 SERIES.....	2
ASSEMBLING THE Q30 / Q30+	3
Q30 SERIES CONTROL PANEL / DISPLAY SCREEN	4
Q30 SERIES FUNCTIONS & OPTIONS.....	6
SEARCH MODES.....	8
PARK	8
FIELD	8
WET SAND and SALTWATER	8
GOLD 1 and GOLD 2	9
FIELD OPERATION.....	10
SENSITIVITY	10
GROUND BALANCING	10
DISCRIMINATION & NOTCH.....	11
SELECTING THE NUMBER OF TONES & ADJUSTING THE TONE BREAKS.....	12
TESTING THE RESPONSE OF YOUR Q30 / Q30+	12
PROPER SEARCH TECHNIQUES	13
PROSPECTING	13
SHALLOW WATER HUNTING / DIVING.....	14
RELIC HUNTING	14
PINPOINTING TARGETS	14
PAIRING THE WIREFREE HEADPHONES TO THE Q30+	15
THE QUESTGO APPLICATION	15
TROUBLESHOOTING.....	16
PRODUCT CARE & MAINTENANCE.....	17
SPECIFICATIONS	18
WARRANTY INFORMATION	19
ACCESSORIES FOR THE Q30 SERIES.....	20
CODE OF ETHICS	21

INTRODUCTION TO THE Q30 SERIES

Congratulations on Your Purchase!

Welcome to the exciting world of Treasure Hunting and congratulations on your purchase of a Quest 30 Series metal detector.

The entire line of Quest metal detectors has been designed to offer today's treasure hunters high quality yet affordable equipment that provides exceptional performance in the field under a wide range of conditions. The Quest 30 Series has features typically found on detectors costing and weighing much more yet are easily adjustable to suit your personal preferences and needs.

The Q30 series of metal detectors from Quest brings a wide range of features to today's treasure hunters at an extremely affordable price tag. Now you can receive high-end performance at an entry-level price and start finding valuables as soon as you unpack and assemble your new detector.

This Operating Guide will help you assemble and understand the controls in short order which will let you get out in the field and start finding lost valuables with confidence. It covers the Q30 series which includes the Q30 and the Q30+. The only difference between the two models is that the Q30+ comes with wireless capabilities built-in and includes a set of Quest's WireFree Lite headphones.

So let's get started mastering your new Q30 or Q30+!



ASSEMBLING THE Q30 / Q30+

The Q30 series comes packaged with everything you need to quickly assemble it and start finding treasure. After unpacking all of the parts included in the package, perform the following to assemble your new detector:

1. Install black rubber washers on lower rod and attach the search coil using the bolt and thumbnut provided. **CAUTION:** Do not overtighten the bolt as it can cause the mounting points to crack.
2. Insert lower rod into center rod and use the camlock to secure the lower rod in position.
3. Insert the center rod into the upper rod and repeat the process of securing it in place using the camlock.
4. Slide the control pod assembly onto the upper shaft and position it roughly in the center of the shaft. Lock it into position with the camlock on the base.
5. Mount the arm cuff / stand in place using the small screw located on the bottom of the assembly.
6. Extend the lower and center shaft sections to a comfortable length based on your height. Secure them in position with the camlocks.
7. Wind the search coil cable around the rods starting by looping the cable over the top of the lower shaft and continuing to do so until the plug reaches the control pod. Plug the cable into the connector on the back of the display. Tighten the retainer ring securely. **CAUTION:** Do not wrap the cable too tightly as it can be pulled out of the coil if the coil is bent over. This will **NOT** be covered under warranty!
8. If desired, thread the Velcro arm cup through the slots on the arm cup. With your arm in position, fold the strap over onto the Velcro so that the strap is loose enough to pull your arm in and out of the arm cup when put it down to recover a target.
9. Grip the detector and sweep the search coil over the floor. If the fit feels uncomfortable, adjust the position of the center rod, the lower rod or the control pod / handgrip assembly using the respective camlocks. The ideal position allows you to stand up straight and sweep the search coil over the ground without stooping over.
10. Connect the charger cable that comes with the detector and connect to a standard USB wall / car charger plug. Leave the detector plugged in for approximately 3-4 hours to fully charge the battery for the first time.
11. Connect the charging cable to the wireless headphones (Q30+ only) and allow them to fully charge before using them for the first time. The GREEN light will go out once the battery is charged.

That's all there is in assembling your new detector

Let's get started learning what it offers and how to use it in the field!

Q30 SERIES CONTROL PANEL / DISPLAY SCREEN

The layout of the controls of the Q30 series makes sure that any adjustment can be made quickly and without having to scroll through multiple layers of onscreen menus. The detector is controlled through:

- Two touchpads on the upper left side of the control housing
- One touchpad on the upper right side of the control housing (the Q30+ has one additional touchpad)
- Five touchpads on the face of the control housing



TOUCHPADS:

- **[A] - Touchpads on the left side of the housing:** These are used to adjust the audio volume heard from the internal speaker / headphones as well as to select the level of vibration felt in the handgrip if you have opted to mute the detector and be alerted to targets by vibration. This is extremely useful when hunting underwater without waterproof headphones or if you are hearing impaired to any degree.
- **[B] - Touchpad on the right side of the housing (bottom one on the Q30+):** This activates one of the two levels of backlighting provided for the LCD screen which helps when searching in low or no-light conditions. It also turns this function off to save battery life.
- **[C] - Upper touchpad on the right side of the housing (Q30+ only):** This activates the wireless audio function and allows the Q30+ to connect to the WireFree Lite headphones that are included with the detector (see pairing headphones section for details).
- **[D] – Up / Down Touchpad:** This is used to adjust the detector’s Sensitivity when the main search screen is displayed or one of the specific functions available in the individual search modes when in the Menu Options mode. (see Search Modes section for which functions can be adjusted in each Search mode)
- **[E] – Pinpoint:** This activates the non-motion pinpoint circuit that allows you to zero-in on detected targets to speed recovery.

- **[F] – Power & Menu Selection touchpad:** This is a dual function touchpad. When pressed and held, it turns the detector ON or OFF. When pressed and released, it cycles through the various adjustments shown through the icons and messages on the bottom of the screen. These will be covered later in more detail.
- **[G] – Notch Discrimination Accept / Reject touchpad:** This allows you to accept / reject any of the individual segments shown around the outer edge of the LCD screen when the EXCLUDE ID option is selected from the menu
- **[H] – Ground Balance / Search Mode Select touchpad:** This touchpad has a dual function – it allows the Ground Balance to be set precisely and is also used to select the desired Search Mode. Both functions will be covered later in this guide.

ICONS

- **[1] – Audio / Vibrate Mode:** This informs you as to which method of alerting the user to a detected target is active; i.e., either the Audio or Vibrate mode.
- **[2] – Battery Strength Indicator:** This icon shows you the current strength of the internal Li-PO rechargeable battery.
- **[3] – Search Modes:** The active search mode is shown via the icons across the LCD screen. The Q30 series has six (6) different search modes to select from based on the type of site you are hunting and the type of targets you are searching for.
- **[4] – Setting Options:** The settings that can be adjusted in each of the search modes will displayed across the screen below the Search Mode icon. **NOTE:** Different search modes will have different settings that can be adjusted.
- **[5] – Audio Mode:** This icon will reflect the audio option that is in use; i.e., wired headphones (including underwater headphones), wireless headphones (Q30+ only) or the internal speaker (no icon will be shown)
- **[6] – Target ID Notch Arc:** There are 25 individual segments along the arc that represent targets ranging from iron (all the way to the left) all the way up to high-conductive targets such as silver (all the way to the right). Each of the segments can be accepted (clear) or rejected (black) to select what targets produce a response or are ignored .
- **[7] – Sensitivity:** This provides a quick indication as to the relative sensitivity setting of the detector. If you press the UP / DOWN arrow touchpad while in the main search mode, the actual sensitivity setting will displayed and can be adjusted with the UP / DOWN touchpad.
- **[8] - Target Depth Indication:** This icon will provide a quick approximation of a detected target's depth where each segment represents approximately 2 inches on a coin-sized object (**NOTE:** larger objects will appear shallower than they are and smaller targets will appear to be deeper than they are).
- **[9] – Other Icons:** There are three more icons that can appear in this area of the LCD screen. All three are shown in the figure on the preceding page; however, they will only appear when the specific function is active. They are:
 - **Pinpoint Active:** The symbol on the left will appear when the non-motion pinpoint function has been activated and disappear when the detector is in one of the search modes.
 - **QuestGo Application Active:** The Q symbol will appear when the QuestGo application installed on your smart phone is active and connected to the detector (see the following section for details)
 - **Ground Tracking Active:** The Q30 series has the ability to continually monitor the ground conditions and automatically adjust for changes in mineralization that could adversely impact detection depth or overall operation. The following section covers how to activate / deactivate this function.

Q30 SERIES FUNCTIONS & OPTIONS

The layout of the controls on the Q30 series ensures that any adjustment can be made quickly through the touchpads on the face of the control housing without having to scroll through multiple layers of complicated menus. This section covers what the functions & options are and how to adjust them.



DISCRIMINATION [*This function is available in all of the search modes*]



A metal detector is designed to do one thing and that is to locate buried metal. In some cases you may want to search for all metal objects in the ground but for most treasure hunters, having the ability to select which targets to accept and which to reject is a necessity. The Q30 series allows this to be done through its Discrimination circuitry. The Q30 series provides information on a target's probable identification to help you determine if it is something you want to recover. When a target is detected, the detector's circuitry analyzes the signal and assigns a specific number ranging from 1 to 99 based on the target's conductivity. Objects made of iron tend to read at the lower end of that scale while high-conductive targets such as those made of copper or silver fall at the upper end of the scale. The arc around the outside of the LCD screen contains 25 segments and each segment represents four (4) Target ID numbers. If the segment is black, the Target IDs it represents will be rejected. Conversely, if the segment is clear, the Target IDs it represents will be accepted. The default discrimination in each of the search modes is listed in the table below; however, you can quickly modify the discrimination settings and the changes will be retained when the unit is turned off. If you want to restore the default settings, simply perform a Factory Reset as described later in this section.

SEARCH MODE	REJECTED TARGET IDs	ACCEPTED TARGET IDs
PARK	01 to 4	05 to 99
FIELD	01 to 8	09 to 99
WET SAND	01 to 16	17 to 99
SALT WATER	01 to 16	17 to 99
GOLD 1	NONE	ALL
GOLD 2	NONE	ALL

THRESHOLD [*This function is available only in the GOLD1 and GOLD2 search modes*].



The two GOLD search modes are different than the other search modes on the Q30 series. This is because you are typically looking for very small pieces of gold or other metallic minerals and sensitivity to those small targets is highly desired. When using the GOLD mode you will hear a constant audio signal or threshold in the background. When you pass over very small items or those at the edge of detection depth on the detector, you may only hear a slight increase in the threshold sound. This is the type of signal you are looking for in most prospecting applications. Depending on the type of headphones you are using, you may need to adjust the level of the threshold sound you hear. You want to adjust the threshold so that you can barely hear it yet are still able to hear slight changes indicating a very small or deep target has been detected.

TONES - [*This function is available in the PARK, FIELD, WET SAND and SALT WATER search modes*]



This function allows you to select the type of audio response detected targets produce. There are four options to choose from – 2 Tone, 3 Tone, 4 Tone and Pitch. The tones produced in the first three options can be used to help identify targets and when combined with the Target ID # on the screen, allow you to determine which targets to recover.

- In 2-Tone, the default setting produces a low tone for iron and all other targets to produce a mid-tone.
- In 3-Tone, the default setting produces a low tone for iron, a mid-tone for nickel, gold or zinc targets and a high tone for silver and copper items.

- In 4-Tone, the default setting produces a low tone for iron, nickel or smaller gold targets produce a slightly higher tone, larger gold items, some aluminum or zinc coins produce a higher tone and silver or copper items produce the highest tone.
- In Pitch, the audio response for all accepted targets varies in pitch based on the strength of the signal produced by the target; i.e., deeper targets produce a low pitch while larger or shallow targets produce a high pitch audio signal.

TONE BREAK [*This function is available in the PARK, FIELD, WET SAND and SALT WATER search modes*]



You can change the point at which each tone starts when either the 2, 3 or 4 Tone audio option has been selected. Once this function been selected, use UP/DOWN button to change the tone break point. The adjustment starts from low tone to higher tones setting. Press the MENU touchpad to set the next tone break point.

FESEN - [*This function is available in the PARK, FIELD, WET SAND and SALT WATER search modes*]



This function allows you to adjust the volume of iron targets that fall in the first segment on the arc; i.e., 1 to 4. When set to "5", iron targets will produce a signal at the same volume as accepted targets that register from 5 to 99. As the FESEN value is reduced, the volume from these low-conductive targets will become weaker allowing you to hear the iron and ignore it based on its volume. If you do not want to be bothered by signals from iron that registers in this range, simply set the FESEN function to "0" and they will not be heard as the coil passes over them. **NOTE:** There are times when you want to hear iron targets and those applications will be discussed in the section covering Relic Hunting.

FREQUENCY SHIFT - [*This function is available in all search modes*]



You can shift your operational frequency slightly to avoid interference, particularly from another detector operating near-by or from power lines, electric fences or electrical transformers. **NOTE:** To make this adjustment, press and hold the Ground Balance touchpad (see "H" on the figure shown on page 4) and press volume adjusting touchpad (See "A" on the figure).

GROUND TRACKING - [*This function is available in all search modes*]



This function allows your detector to automatically monitor the mineralization present under the search coil and adjust for changes that occur as you move across your hunt site. Ground conditions can often change considerably in short distances and the Ground Tracking function ensures that your detector is running at optimal performance even as conditions change. **NOTE:** To activate the Ground Tracking function, press and hold Ground Balance touchpad (see "H" on the figure shown on Page 4) and tap the Menu touchpad (see "F" on the figure). To deactivate the function, repeat the process. The icon on the upper portion of the screen will appear / disappear based on the status of this function (see "9" on the figure).

RESET DETECTOR



There may come a time when resetting your detector to the factory settings is desired. To perform a reset, press and hold the POWER touchpad (see "F" on the figure on Page 4). When the screen cycles through the main search screen and then restarts, your detector will have been reset to factory settings. Release the touchpad and make the necessary adjustments to set it for maximum performance in your search location.

SEARCH MODES

The Q30 series has been designed to provide exceptional performance for a wide range of applications and ground conditions. Unlike many detectors that have limited adjustability to switch from one type of treasure hunting to another or require users to navigate through layers of complicated menus to find the right settings, the Q30 series has done the hard work for you by providing multiple search modes accessible from the main screen which require at most, just a few minor adjustments to meet your personal preferences and achieve maximum performance.

Selecting the desired Search Mode is done through the use of two touchpads when the main search screen is displayed. Press and hold the touchpad labeled “H” on page 4 and then use the Up / Down touchpad labeled “D” to scroll through the six possible search modes. Release the touchpad and your detector will be in the desired search mode with predefined settings designed to have you finding treasure rather than making endless adjustments in the field.

PARK



This search mode is intended for use in sites that have a large number of targets in close proximity to one another. These can either be good targets or trash. Remember, trash can be either ferrous; i.e., iron or non-ferrous; i.e., aluminum, tin foil, etc. in nature. The recovery speed (how quickly the detector resets after passing over a target so it can detect another one) is faster than the FIELD mode which helps separate targets from one another. Specific functions that can be fine-tuned based on the specific site conditions in PARK mode include:

- Notch Discrimination (target accept / reject) – see the table on Page 6 showing what targets are accepted / rejected using the factory preset settings
- Tones (# or Pitch)
- Tone Break Points
- Iron Sensitivity
- Discrimination Sensitivity

FIELD



This search mode is intended for use in sites where targets are more spread out and unwanted targets are typically ferrous in nature (iron). While the recovery speed is a little slower than the PARK mode, it is slightly deeper in terms of detection depth and offers improved Target ID stability. Specific functions that can be fine-tuned based on the specific site conditions in FIELD mode include:

- Notch Discrimination (target accept / reject) – see the table on Page 6 showing what targets are accepted / rejected using the factory preset settings
- Tones (# or Pitch)
- Tone Break points
- Iron Sensitivity
- Discrimination Sensitivity

WET SAND and SALTWATER



These search modes are intended to be used on saltwater beaches that have black sand present or when the coil is fully submerged under saltwater. The WET SAND mode can also be used on freshwater beaches if the sand is mineralized as you get to where the sand is wet from wave action. They offer two distinct tones – a low tone and a high tone – in addition to the Target ID value displayed on the screen to aid in identifying targets before you recover them. If you are hunting the dry sand section of a beach, either the PARK or FIELD search modes will be the preferred search mode due to the additional functions available. The WET SAND and SALTWATER search modes are designed to be used under specific conditions that challenge many other detectors and offer notably enhanced performance. Specific functions that can be fine-tuned based on the specific site conditions in WET SAND and SALT WATER modes include:

- Notch Discrimination (target accept / reject) – see the table on Page 6 showing what targets are accepted / rejected using the factory preset settings
- Tone Break point
- Iron Sensitivity
- Discrimination Sensitivity

GOLD 1 and GOLD 2



This search mode operates differently than the other search modes on the Q30 series. Rather than operating silently until a target is detected, a background threshold will be heard as you sweep the search coil over the ground. On larger targets or those just under the surface, you will be alerted by an audio “beep” much the way you would in one of the other search modes. On smaller targets or those that are extremely deep which is how most gold is found, the response is often just a slight increase in the threshold signal that repeats as you pass back-&-forth over the target. This is the most sensitive of the search modes on the G30 series but does take some practice to ensure you are getting the most out of the detector when it has been selected.

Specific functions that can be fine-tuned based on the specific site conditions in the GOLD 1 mode includes:

- Discrimination – The factory preset setting is that nothing is rejected which is recommended to ensure very small pieces of gold are not missed. If you are finding trash that needs to be eliminated, you can use this function to increase the discrimination level to accomplish that. **NOTE:** This search mode does **NOT** offer notch discrimination so you may reject good targets if too much discrimination is used.
- Threshold – This sets the strength of the audio threshold discussed above. Depending on the type of headphones you are using and your hearing, this may need to be adjusted
- Discrimination Sensitivity

Specific functions that can be fine-tuned based on the specific site conditions in the GOLD 1 mode includes:

- Discrimination – The factory preset setting is that nothing is rejected which is recommended to ensure very small pieces of gold are not missed. If you are finding trash that needs to be eliminated, you can use this function to increase the discrimination level to accomplish that. **NOTE:** This search mode does **NOT** offer notch discrimination so you may reject good targets if too much discrimination is used.
- Threshold – This sets the strength of the audio threshold discussed above. Depending on the type of headphones you are using and your hearing, this may need to be adjusted
- Tone Break – This search mode has 2-Tone audio and this allows you to adjust at what point the 2nd tone is produced; i.e., a low tone for targets in the range of 0 to the break point and a high tone for targets above that point.
- Discrimination Sensitivity

FIELD OPERATION

The preceding section covered all of the Q30's functions as well as the various search modes that can be selected based on the type of site you are searching and the type of target(s) you are looking for. This section will take you from reading about the functions it offers to putting the detector to use in the field.

SENSITIVITY

The Sensitivity control is probably the most commonly mis-adjusted function on any detector due to users misunderstanding how it functions. It does **NOT** put more power out of the coil to provide in more detection depth so always setting it a maximum value often results in fewer finds and more frustration. The Q30's Sensitivity control can be adjusted from a value of "01" (minimum) to "99" (maximum).

For general use, the optimal range is between "80" and "95". If set too high for the site conditions, the detector will chatter audibly and the display will be unstable. This can be caused by ground mineralization, electrical interference or a high concentration of targets in the search area. Reduce the setting using the UP / DOWN touchpads from the search screen until the detector operates smoothly. It is better to reduce the sensitivity level and have the detector be stable than trying to push it too high and be challenged with false signals and erratic operation.

The factory preset sensitivity values in each search mode are shown in the following table. As you can see, while the preset value in most search modes has been set low enough to ensure the detector operates stably, for optimal operation and performance, the sensitivity should be increased in the field as described above.

FACTORY PRESET SENSITIVITY VALUE					
PARK	FIELD	WET SAND	SALTWATER	GOLD 1	GOLD 2
70	85	70	70	70	70

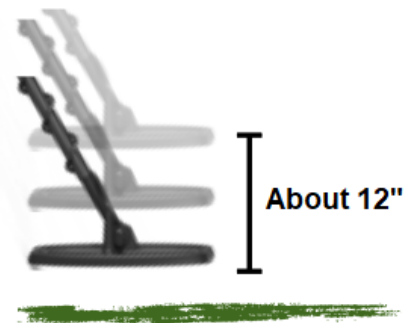
GROUND BALANCING

Mineralization in the ground can affect how any metal detector performs. The more mineralized the ground is, the more the signal being sent into the ground is affected which results in reduced detection depth, less accurate target identification and more chatter as you sweep the coil over the ground. Your Quest Q30 and Q30+ has the ability to ignore the effects of ground mineralization through its Ground Balance circuit. It is recommended that you use the Ground Balance function whenever you arrive at the hunt site to ensure the detector is set properly.

To set the Ground Balance, press and hold the Ground Balance touchpad (see "H" on Page 4) while pumping the coil towards the ground and then raising it about 1 foot. Continue the pumping until you hear a short beep and note that the Ground Balance setting as shown on the screen stabilizes.

➤ While areas with no or very low levels of mineralization may not have a noticeable impact on the Q30's performance, it is recommended that you check the ground conditions whenever you start hunting.

➤ If you notice that the ground conditions have changed from where you started, repeat the process to ensure the Q30 is ignoring the mineralization present in your current search area.



- The Q30 and Q30+ have a Ground Tracking function that can help keep the detector properly adjusted as ground conditions change. This function can be activated / deactivated using the guidance on Page 7.

NOTE: The Ground Track function is **NOT** recommended when searching sites that contain a large number of targets (either trash or valuable targets). The circuit can track to the metallic objects rather than only the mineralization resulting in erratic operation and less than optimal detection depth. In these areas, manually set the ground balance using the bobbing technique described above periodically to ensure the detector is set properly.

DISCRIMINATION & NOTCH

The Q30 series offers the ability to select what targets will produce an audio response as you search a site. While there may be times when you want to detect all metallic objects in your search area such as if you are performing an archeological survey, in most case you will want to eliminate at least some of the targets to save time and increase your find rate. You can always reduce the number of targets being rejected and re-hunt the site if the finds warrant doing so at a later date.

The Q30 series has 25 segments on the arc that circles the outer edge of the LCD screen with each segment encompassing four (4) numbers. Each of the segments can be turned off (clear) to indicate an audio response will be produced or on (black) meaning no audio response will be produced as the coil passes over a target that corresponds to the specific segment.

To start with, using the Q30 series with the factory preset settings will help you get familiar with the type of targets that register in each area of the arc. As you become more familiar with the detector and understand what targets are worth ignoring at a specific hunt location, you can add or remove specific segments to create a custom pattern that allows you to selectively eliminate what you consider trash and focus on the high-value targets.

To adjust the level of discrimination being applied, press the Menu Selection touchpad (see “F” on Page 4) until the arrow icon above the DISCRIMINATION icon appears along the lower portion of the screen. Using the UP / DOWN touchpads, move the flashing segment to the block you either want to reject (if it is currently clear) or accept (if it is currently black). Tap the upper right touchpad (see “G” on Page 4) to make the desired change. Continue this until you have customized the level of discrimination to meet your needs on the site you are planning on searching.

NOTE: Any changes you make to the discrimination level in a specific search mode will be retained when you turn your detector off which makes it simple to create a custom setting that can be used at multiple locations.

An example of where discrimination can be used effectively to recover U.S. coins in an area that is currently in use and littered with trash such as pull-tabs, screw caps and tin foil is to start with the PARK search mode and add DISCRMINATION so that the final pattern includes the following:

SEARCH MODE	REJECTED TARGET IDs	REJECTS	ACCEPTED TARGET IDs	DETECTS
PARK	01 to 20	Small iron, tin foil, slivers of aluminum	21 to 32	U.S. 5c, Small gold jewelry
	33 to 52	Pull tabs, aluminum, small screw caps	53 to 96	Indian Head cents, copper, clad & silver coins
	97 to 100	Large rusted iron		

Now of course this is not the level of discrimination one would use in areas where there could be relics, jewelry and other interesting non-coin objects or outside of the United States but if you have a limited amount of time available and simply want to pick up coins in a particular search area, using increased levels of discrimination can make the difference between an average day and one where you leave the area with a pouch filled with keepers. Be selective in how much discrimination you decide to use – remember, the less discrimination you use the more you will dig but some of those targets might turn out to be the find-of-the-day!

SELECTING THE NUMBER OF TONES & ADJUSTING THE TONE BREAKS

The Q30 series offers users with a choice of audio options that can help identify targets before recovering them. The choices are 2-Tone, 3-Tone, 4-Tone and Pitch.

Most users will opt for one of the three Tone options. They allow you to select how many tones you hear when targets are detected and then define what range of target IDs will produce each of the selected tones. For example, if the 3-Tone option has been selected through the menu, the low tone indicating iron can be set at “8”, the mid-tone set at “65” for tin and most gold jewelry and the high tone covering the rest of the range. This is where seeing where certain targets you are seeking register will prove useful in adjusting the tone breaks.

CAUTION: Be careful simply using the break points from other user unless they are searching for the same type of targets you are as you may overlook targets that you would have recovered had you done some testing in your area using your targets. That is one drawback of exchanging settings over the Internet with someone that lives on the other side of the world.

The Pitch audio option offers little tonal information about detected targets but rather varies in pitch based on signal strength which typically lets one know how close the target is to the coil. This option is often used by relic hunters that are more interested in recovering all targets in an area than wanting to be selective in what is recovered.

TESTING THE RESPONSE OF YOUR Q30 / Q30+

Before heading out into the field with your new detector, taking a few minutes to become familiar with the response the type of targets you expect to come across – good or bad – produce will help shorten the learning curve and let you start finding more in less time. Start by collecting samples of the type of targets you can expect to find and don't forget to include some trash targets you can expect as well so you start to learn what not to dig.

Lay your Q30 on a table with the coil away from any metal and remember, the coil will detect objects both above and below it as well as off to the sides. Turn the detector on and select one of the Factory Preset search modes. Pass each target about 4” from the top of the coil going from side-to-side; i.e., across the “hot strip” down the center of the coil at a normal coil sweep speed. Listen to the audio response and watch the LCD screen. Switch to each of the preset search modes and see how the response differs between them.

Create a test garden by burying some of your test targets a few inches deep and marking where each is located. By using a test garden, you will be much more successful each time you head out into the field since you will UNDERSTAND what your detector is telling you. By changing settings such as Discrimination Sensitivity, FESENS, Tones and even Search Modes you will see how they can affect the type of response specific targets will produce. Be sure to take some time to go through your test garden on a regular basis to help hone your pinpointing and target identification skills. If you buy a new coil, use the test garden to see how the new coil affects the detector's response to known targets. Remember, your success in the field is

directly tied to how efficiently you locate and recover targets. The better you can differentiate between good and bad targets and the faster you can pinpoint and recover them, the more you will have to show for your efforts at the end of the day.

PROPER SEARCH TECHNIQUES

The proper search technique will make a big difference in how successful you are in the field. Your sweep speed as well as how high you hold the coil off the ground are essential in getting the most out of your detector.

As far as coil height, the best recommendation is to scrub the ground with the coil. There is a coil cover on the bottom of the search coil designed to protect the coil itself and if you need to replace it, the cost is minimal. Remember, if you are able to detect an average-sized coin 8 inches away from the coil and you are holding the coil 4 inches above the ground, you have just cut your detection depth in half before you even passed over your first target.

When it comes to sweep speed, try to keep the speed around 2 to 3 seconds from one side to the other. While your detector will pick up a target sweeping much faster, it will tire you out in short order and creates the chance that you will miss a target. Since the Quest detectors use Double-D coils, you do not have to overlap each sweep as much as you would with a concentric coil but some overlap is recommended to ensure you do not miss passing the coil over all targets in your search area.

CAUTION: The circuit in the Q30 series requires that the search coil be in motion in order for a target to be detected. If you slow down too much trying to pinpoint the target without activating the pinpoint circuit, the signal will disappear leading you to believe there is nothing there. Rather than slowing your sweep speed to almost nothing, try wiggling the coil side-to-side no more than an inch or two as this will prevent you from losing the signal.

If you are new to the hobby of metal detecting or you are not familiar with how the Q30 series responds, try tossing targets including coins and trash on the ground and sweep the coil over them while holding it a few inches above them (see Testing the Response of Your Q30 / Q30+ above).

PROSPECTING

When using your Q30 / Q30+ for prospecting, GOLD 1 or GOLD 2 will be the preferred search modes due to their sensitivity to small targets. Headphones are highly recommended so that you can hear the subtle changes in the threshold which often indicates a small or deep target. Adjust the audio threshold (see Page 6 for details) so that you can hear slight changes easily but not having it so loud as to drown out any changes. The setting will vary based on the headphones used, your personal hearing preferences and the external noise that may be present; i.e., wind, birds, leaves, etc. Be sure to test the detector's response to small targets such as fishing sinkers, .22 caliber bullets, BBs, an earring back, etc. Practicing on these before you head out looking for metallic minerals such as gold and silver will eliminate frustration and ensure you are successful in your searches.

TIP: Using GOLD 1 or GOLD 2 when searching the dry sand regions of swimming beaches can help you find fine gold jewelry such as earrings, chains, charms and small, thin rings. Use the detector the same way you would when prospecting . . . use headphones, adjust the audio threshold and listen for weaker signals which can indicate the type of targets that beach hunters are searching for.

SHALLOW WATER HUNTING / DIVING

The Q30 series has been designed to allow you to extend your searches into the water to find what many other detectors are not able to reach. The Q30 and Q30+ are rated to be fully submerged up to a depth of 16 feet (5 meters). The wireless headphones that come with the Q30+ are **NOT** waterproof and submerging them will result in damage not covered under warranty. An optional set of waterproof headphones can be used on either Q30 model and this is the recommended option for searching in shallow water or when diving. They simply screw into the jack on the rear of the control pod and provide ample volume for both above and below water searching.

TIP: To quickly recover a target in shallow water when wading with your Q30 / Q30+, either wiggle the coil back-&-forth a few inches or switch to Pinpoint to center the coil over the target. Rest your foot alongside the coil and then move the coil away so that your scoop does not interfere with it. Place your scoop along the side of your foot where the coil was and press down to remove the sand and target from the area. Sift the sand from the scoop and remove your target. Check the hole to ensure you did not have multiple targets in the hole before moving on. Once you start searching in water deeper than your knees, investing in a quality long-handled scoop such as Quest's Scoopal will allow you to recover targets faster which means more targets in your pouch at the end of the day.

When using the Q30 / Q30+ for diving, simply shorten the shaft length using the camlocks so that you can swing it easily yet not detect your regulator or mask.

TIP: The vibration mode is ideal for diving as targets can be detected through the vibration felt through the handgrip. This can eliminate the need to use underwater headphones if the vibration can be felt when wearing gloves.


RELIC HUNTING

Relic hunting involves searching for a wide range of targets that can date back 100's or even 1,000's of years depending on the age of the site. Often there will be no sign of buildings that may have existed on the site which makes finding the location to search a challenge. This is where the Q30's ability to detect all metallic objects in the ground and either reduce the volume of ferrous items or set the audio tone to one that is easily recognizable for these types of targets can help quickly locate the desired search location. Once you have found the site of a long-forgotten structure, you can opt to increase the amount of discrimination used to increase the number of "keeper" targets recovered but remember, in doing so you have the potential to miss ferrous relics such as artillery shell fragments, iron artifacts and the like. You may also miss a non-ferrous target that is being masked by a larger, adjacent ferrous target. This is why relic hunters tend to use minimal discrimination and dig almost every target they come across. This may not be possible in all areas; however, if you have the time and patience, doing so will ensure you leave very little behind that would have made a welcome addition to your collection.

PINPOINTING TARGETS

Locating a target is only half the challenge when it comes to adding it to your collection . . . you still need to recover it. The more accurately you pinpoint a target, the faster you will be able recover it and move on to the next target. Practicing on targets that you have buried in your yard will shorten the time needed to become proficient at pinpointing targets and allow you to find more in the time you have in the field.

NOTE: When the PINPOINT function is activated, the LCD screen will display the detected target's depth in inches.

Pinpointing with the “Criss-Cross” Method	Pinpointing with the “Detuning” Method
<ol style="list-style-type: none"> 1. Move the coil off to the side of the detected target 2. Press and hold the PINPOINT touchpad 3. Move the coil over the area where the target was detected in an “X” pattern (see figure to the left). 4. Watch the screen and see where the shallowest depth reading is shown and the loudest audio signal is produced. 5. The target should be directly below the coil just in front of where the shaft connects to the coil at the indicated depth. 	<ol style="list-style-type: none"> 1. Move the coil off to the side of the detected target 2. Press and hold the PINPOINT touchpad 3. Move the coil towards the area where the target was detected 4. As the audio signal starts to increase, release the PINPOINT touchpad and immediately press and hold it again. The audio response will disappear as the detector detunes itself to the target. 5. Continue slowly moving in towards the target area and repeat step 4 until you are receiving just a small, well-defined audio response from the target. 6. When you have detuned the detector to the point that you only get a signal over a small area, target will be directly below the coil just in front of where the shaft connects to the coil. <p>NOTE: If you detune it to the point the signal disappears completely, simply move away and start the process over again.</p>

PAIRING THE WIREFREE HEADPHONES TO THE Q30+

The Q30+ has built-in wireless audio capabilities and comes with a set of Quest’s WireFree Lite wireless headphones. To pair the headphones to the Q30+, turn on the detector and press the upper touchpad on the right side of the control housing. The wireless icon will start to flash (see “5” on Page 4). Press the power button on the WireFree Lite wireless headphones and the icon will go solid in a second or two indicating that the connection has been established. When you are done hunting, be sure to turn off both the detector and the WireFree Lite wireless headphones so you do not find yourself with a set of headphones with a dead battery the next time you go to use them.

NOTE: The Q30+ will remember that the wireless audio option was selected the next time you turn it on so if you are not using the WireFree Lite wireless headphones, be sure to turn off the wireless audio function so the icon is not flashing. If you do not do this, there will be no audio heard from the internal speaker.

THE QUESTGO APPLICATION



Quest Metal Detectors has designed an application for your smart phone that allows you to track where you have searched using your phone’s GPS function, log finds you have made and update the Q30’s internal firmware programming when updates are released. This application is called QuestGo and is available at no cost through the App Store (for iPhones) or Google Play (for Android). Once you have downloaded the application to your phone, open it and create an account to unlock its features. For details on how to connect the QuestGo application to your detector and then use it to both record your searches and update your

detector, review the QuestGo guide available through the Quest Metal Detectors website. Once your phone has been connected to your detector, a large “Q” will appear in the upper area of the LCD screen (see “9” in the figure on Page 4).

TROUBLESHOOTING

SYMPTOM	SOLUTION
The detector does not turn on	<ul style="list-style-type: none"> • Ensure the battery is fully charged • If battery is fully charged, contact your dealer to help resolve the problem
The detector turns on but will not detect metal	<ul style="list-style-type: none"> • Ensure the search coil is properly connected to the control housing • Check the Sensitivity level – if set too low, detection depth will be greatly limited
Target detection appears on the screen but there is no audio signal	<ul style="list-style-type: none"> • Ensure the volume is not set too low • Check to see if there are headphones connected to the back of the control housing • Plug in a set of headphones to see if there is a problem with the internal speaker • Ensure the wireless option has not been activated (see flashing icon on the upper right side of the screen)
Excessive chatter or false signals received as the coil is swept across the ground	<ul style="list-style-type: none"> • Reduce the Sensitivity level • Try using the Frequency Shift function to minimize or eliminate the chatter • Check the Ground Balance as ground conditions may have changed • Try another part of the site you are searching – there may be a large number of targets present • Electrical interference in the area may be the cause. If reducing Sensitivity does not help, you may need to come back at a different time to see if the cause is no longer present.
Overload audio signal	<ul style="list-style-type: none"> • The overload signal indicates that the detected target is either very shallow or very large. Try lifting the coil a few inches and recheck the area.
Target ID #'s and audio tones jump around	<ul style="list-style-type: none"> • Typically this indicates the coil is either passing over multiple targets, an irregularly shaped object or trash. Turn 90 degrees and wiggle the coil across the target side-to-side an inch or two. This will help you separate multiple targets or determine if it is a larger piece of trash.

If the solutions above do not address the issue you are experiencing, try resetting the Q30 / Q30+ to its factory settings. Turn the detector off and then hold the POWER touchpad for 5 seconds. All of the icons on the screen will illuminate indicating the detector has been reset and this should have resolved your issue. If not, service may be required. Contact your authorized service center for information on obtaining service.

PRODUCT CARE & MAINTENANCE

Your Quest metal detector was built to provide years of trouble-free operation but there are a few simple things that you can do to ensure it continues to operate without issue year-after-year.

- Do not wrap the coil cable too tightly around the shaft as adjusting the coil can pull on the cable damaging the wire or the connection
- Do not store the device where prolonged exposure to extreme temperatures can occur to avoid damaging the electronics. Leaving it in a car during the summer or winter should be avoided for this reason.
- Never use a hard or sharp object to operate the touchpads or damage may result. This can also penetrate the touchpad allowing it to leak when submerged.
- Avoid chemical cleaners, solvents, and insect repellents that can damage plastic components and finishes.
- Secure the weather cap tightly to prevent damage to the USB port or allow moisture / sand to enter it when in the field.
- Even small amounts of moisture can cause corrosion of the electrical contacts when connected to a charger – ensure it is dry before starting the charging process.
- If you are storing the detector for an extended period of time, recharge the internal battery every few months
- The Q30 / Q30+ is fully submersible. When you take it out of the water, rinse it and your waterproof headphones (if attached) with fresh water to remove any sand or salt which can cause problems if allowed to buildup.
- The detector itself is fully waterproof; however, the wireless headphones are not. **DO NOT** take them in the water as it will damage the internal electronics.
- Periodically remove the coil cover on the bottom of the coil to remove any dirt, sand or salt that has accumulated inside. Excessive buildup of salt or sand can cause erratic operation of the detector.

CLEAN YOUR DETECTOR WHEN YOU GET HOME

- Turn off the detector before you start to wipe it down
- Disassemble the shafts and flush dirt / sand from inside the shafts as well as the camlocks
- Rinse it with fresh water (not the wireless headphones)
- Wipe the device using a damp cloth using nothing more than a mild detergent solution
- Gently wipe the screen with the cloth
- Wipe it dry with soft, clean, lint-free cloth.
- Allow the device to dry completely before reassembling it

SPECIFICATIONS

Operating Frequency: 14 kHz VLF

Display: 3" LCD 60x45mm

Search Coil: Waterproof Turbo-D Blade 9x5"

Internal Battery: 3,000 mAh Li-Po battery for 14+Hrs of operation

Recharge Method: Magnetic connector

Battery Strength Indicator: Yes

Audio output: Built-in speaker, 3.5mm wired headphones or waterproof headphones

Audio Levels: 15 levels

Vibration Mode: Yes, 2 levels of selectable vibration for target alert

Audio Tones: 4; 2-Tone, 3-Tone, 4-Tone and Pitch

Built-in Wireless Audio:..... Yes (Q30+ only)

Search Modes: Six (Park, Field, Wet Sand, Saltwater, Gold 1 and Gold 2)

Environmental Protection: Waterproof to 16 feet (5 meters)

On-Screen Information: Battery level, Audio level, Target ID, TID bars (25 segments), Target Depth
Sensitivity level, Search modes, Threshold level and # of Tones

Notch Discrimination: Yes, 25 individual segments

Ground Balance: Yes - Automatic / Manual / Tracking

Sensitivity Adjustment:..... Yes, 99 levels

Search Coil Size (as shipped):..... 9" x 11" Raptor Double-D Coil

Interchangeable Search Coils: Yes

Depth Indication: Yes, Inches displayed

Target ID Range: 01 to 99

Armrest:..... Adjustable with built-in stand to hold unit upright

Unit Weight: 1.2 kg. / 2.6 lbs.

Non-Motion Pinpoint Function: Yes

Backlight for Screen..... Yes

Warranty:..... 2 years

WARRANTY INFORMATION

Quest Metal Detectors provides a two-year warranty on all of our detectors.

To register your Quest Q30 / Q30+, please go to our website at www.QuestMetalDetectors.com and click on SUPPORT. Scroll down to REGISTRATION and fill out the form to activate your two year warranty.

If you have difficulty registering your detector online, please contact the dealer you purchased it from to finish the process.

For your records, fill out the form below to help expedite any warranty work that you might require.

Date Of Purchase		MM / DD / YY
Serial Number	Model Name	
<input type="text"/>	<input type="text"/>	
Where Purchased:		
<input type="text"/>		

ACCESSORIES FOR THE Q30 SERIES

Quest Metal Detectors provides a complete line of accessories for your Q30 that will help you enjoy your time in the field as well as find more and recover targets faster. Some of the recommended accessories available from Quest include the following:



XPointer Pro

XPointer®



Diamond Digger



Waist Pouch



DLP Drop-leg Pouch



Scoopal® Sand Scoop



15x11 TITAN



13x9 BEAST



11x9 RAPTOR



9x5.5 BLADE

CODE OF ETHICS

The hobby of treasure hunting has grown exponentially over the past 25 years or so which has turned it into a hobby enjoyed by people of all ages and walks of life. Unfortunately as more and more people explore sites with their metal detectors, there has been an increase in the number of people that are willing to trespass, ignore existing restrictions on where detecting is allowed and leave open holes and trash laying around. This has resulted in many areas being closed to metal detecting which hurts all of us.

=====

Federation of Metal Detector and Archaeological Clubs

The Federation of Metal Detector and Archaeological Clubs Inc. or FMDAC for short is a U.S.-based organization founded in 1984 by hobbyists and manufacturers as a legislative and educational organization dedicated to the preservation, promotion, and protection for the hobby of recreational metal detecting and prospecting. The following *Code of Ethics* is one that was developed and endorsed by the FMDAC and should be part of how you approach the hobby of treasure hunting.

- I will always check Federal, State, County and local laws before searching. It is my responsibility to "know the law".
- I will respect private property and will not enter private property without the owner's permission. Where possible, such permission will be in writing.
- I will take care to refill all holes and try not to leave any damage.
- I will remove and dispose of any and all trash and litter that I find.
- I will appreciate and protect our inheritance of natural resources, wildlife and private property.
- I will as an ambassador for the hobby, use thoughtfulness, consideration and courtesy at all times.
- I will work to help bring unity to our hobby by working with any organization of any geographic area that may have problems that will limit their ability to peacefully pursue the hobby.
- I will leave gates as found.
- I will build fires in designated or safe places only.
- I will report to the proper authorities any individuals who enter and or remove artifacts from federal parks, state / local preserves or designated historical sites.



The National Council for Metal Detecting

The National Council for Metal Detecting is based in the United Kingdom and is a representative body of elected volunteers formed in 1981 to provide a means whereby responsible metal detector users would have a democratic forum to discuss problems affecting the hobby and to provide an authoritative voice to counter ill-informed and frequently misleading criticism of the hobby. The NCMD has gained Government recognition as an organization which represents metal detector users countrywide. It has played a major role in representing the views of those metal detector users to Government Departments regarding legislation affecting the hobby.

NCMD Code of Conduct

1. Do not trespass. Obtain permission before venturing on to any land.
2. Respect the Country Code, leave gates and property as you find them and do not damage crops, frighten animals or disturb nesting birds.
3. Wherever the site, do not leave a mess or an unsafe surface for those who may follow. It is perfectly simple to extract a coin or other small object buried a few inches below the ground without digging a great hole. Use a suitable digging implement to cut a neat flap (do not remove the plug of earth entirely from the ground), extract the object, reinstate the grass, sand or soil carefully, and even you will have difficulty in locating the find spot again.
4. If you discover any live ammunition or any lethal object such as an unexploded bomb or mine, do not disturb it. Mark the site carefully and report the find to the local police and landowner.
5. Help keep Britain tidy. Safely dispose of refuse you come across.
6. Report all unusual historical finds to the landowner, and acquaint yourself with current NCMD policy relating to the Voluntary Reporting of Portable Antiquities in England and Wales and the mandatory reporting requirements in Scotland.
7. Remember it is illegal for anyone to use a metal detector on a designated area (e.g. Scheduled Monuments (SM), Sites of Special Scientific Interest (SSSI), or Ministry of Defense property) without permission from the appropriate authority. It is also a condition of most agri-environment agreements that metal detecting access is subject to certain rules and regulations including mandatory finds reporting of all finds to the Portable Antiquities Scheme.
8. Acquaint yourself with the terms and definitions used in the following documents:
 1. 'Treasure' contained in the Treasure Act 1996 and its associated Code of Practice, making sure you understand your responsibilities.
 2. Advice for Finders of Archaeological Objects including Treasure 2006.
 3. The voluntary Code of Practice for Responsible Metal Detecting 2017 Revision. Note: the NCMD is not an endorsee to this version of the Code. Details of why the NCMD did not endorse the Code can be found in issue 25 of Digging Deep.
9. Remember that when you are out with your metal detector you are an ambassador for our hobby. Do nothing that might give it a bad name.
10. Never miss an opportunity to explain your hobby to anyone who asks about it.

