

Backyard Briefs

A weekly column

By Judy Jessop, A Nature Conservancy Volunteer

Our visitor was most likely a dolphin. There is about a 95% probability that the marine mammal recently spotted above Jamesville was a bottle-nosed dolphin. I have done some checking and it turns out that though these dolphins are seen in the Albemarle Sound, harbor porpoise have rarely been observed there.

You might wonder how bottle-nosed dolphins, which are 5-13 feet long and weigh 350-450 pounds, manage to get around in the murky waters of the lower Roanoke without bumping into something. They have a special sense called echolocation, a kind of sonar that they use to find food and to navigate through the water. It is somewhat like the echolocation used by bats except the echolocation these dolphins use works only in the water. Sound is produced in the dolphin's sinus cavities, and projected toward objects in the water, forming a sound picture that reaches greater distances than their vision. They can see a maximum of 100 feet in crystal clear water; their sonar however, locates objects as much as a mile away. The sounds strike an object (such as a boat, fish or the ocean floor), are reflected back to receivers located in the lower jaw, and relayed to the brain. This allows these animals to easily locate tasty fishes and maneuver with ease, even in dark and murky water.

A bottle-nosed dolphin's brain is actually larger than our human brain. Though scientists believe that much of the size is associated with the development of the sense of hearing and echolocation, many studies suggest other abilities are also well developed. Research has demonstrated that these mammals have a high degree of what we call intelligence. They can learn complex tasks quickly by simply watching other individuals perform. In one experiment trainers were even able to teach dolphins to create new tricks in order to receive a reward.

Each dolphin appears to have their own "signature" whistle (to voice its location, identity and condition) and they often hunt cooperatively, driving schools of fish with high-intensity clicks. In shallow water they have been observed partially beaching themselves in the rush to capture fish. There have now been more sightings of bottle-nosed dolphins near Plymouth with pictures that are posted on the web site (www.roanokeriver.com) so, if you get a chance, take a look.