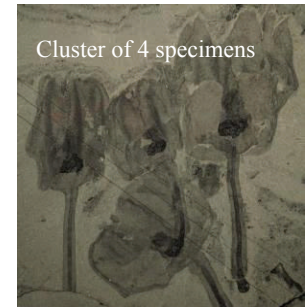


Penzance B.S.A.C. Conservation Officer's Report March 2012



A bizarre creature that lived in the ocean more than 500 million years ago has emerged from the famous Middle Cambrian Burgess Shale in the Canadian Rockies. Named *Siphusauctum gregarium*, fossils reveal a tulip shaped creature that is about 20 centimetres high with a long stem and a calyx (a bulbous cup – like structure) near the top that encloses an unusual filter system and a gut. The animal is thought to have fed by filtering particles from the water pumped into its calyx through small holes. The stem end with a small disc which anchored the animal to the sea floor. *Siphusauctum* lived in large clusters, as indicated by slabs containing over 65 individual specimens.



An international study on the relationships between predators and prey in seven ecosystems around the world provide a reference level for the sustainable management of fisheries, so as to safeguard the seabird population which is often imperilled due to overfishing. The study identifies the level of a critical supply of fish below which the stability of bird population is endangered. From Gannets, terns, puffins, seagulls and penguins; taking all the species together, if fish supplies drop below a third of their maximum size, then the number of baby birds born drop precipitously, everywhere in the world. Once the amount of prey falls below sufficiency the seabirds fail to reproduce. The research team compared the growth in fish supplies and the reproductive patterns of 14 species of coastal birds that mainly feed on sardines, anchovies, herring and prawns, all of which are victims of overfishing. Below the critical level of one third of fish biomass, the birds—and the stability of the entire ecosystem—come under threat.



Puffin

A tiny animal called a Tarsier is an ultrasonic communicator. These pint sized primates from Southeast Asia produce some of the most extreme ultrasonic calls in the animal kingdom, well beyond the threshold of human hearing. They belong to a relict lineage of primates that gave rise to monkeys and apes about 60 million years ago, and for the past 45 million years tarsiers have been largely unchanged. Scarcely five inches high, they are nocturnal and subsist mostly on a diet of insects, along with some small invertebrates such as lizards and snakes and are difficult to study. The tarsiers ultrasonic vocalizations are extreme and comparable to the highly specialized vocalizations of bats and dolphins, which are used primarily for echolocation.



Tarsier

There were only two sightings of Bottlenose Dolphins during February, a small pod of 3 was seen off Newlyn on the 3rd and a pod of 3 was seen off Cot Valley on the 11th. There were 9 reported sightings of Harbour Porpoises, 7 of which were of small pods of from 1 to 7 animals, but the two other reports were of pods of up to twenty well spread out feeding off Porthcurno on the 26th and The Runnelstone on the 28th. A Grey Seal was seen off Penhallic Point near Tintagel on the 5th and a Minke Whale was seen off Gwennap Head on the 9th