

NOAA Teacher at Sea Susie Hill Onboard NOAA Ship ALBATROSS IV July 23 – August 3, 2007

NOAA Teacher at Sea: Susie Hill

NOAA ship ALBATROSS IV Mission: Sea Scallop Survey Date: July 26, 2007 Time: 9:44 a.m. North Atlantic Ocean

Weather Data from the Bridge

Air Temperature: 20.6° C Sea Temperature: 22.6 ° C Relative Humidity: 97% Barometric Pressure: 1022.1 millibars Wind Speed: 3.36 knots Water Depth: 57.2 m Conductivity: 46.15 mmhos Salinity: 31.56 ppt

Science and Technology Log

From noon to midnight, we go from being hot under the shining sun searching for the treasure of scallops in the collected pile to sitting under the beautiful moonlight shining across the vast ocean waiting for the next tow. It's wonderful no matter how you look at science!

Today, I got to start up the starfish study. We are counting starfish from the sort to figure out the abundance and distribution of the *Asterias sp.* and *Astropecten sp.* in the researched area. Depending on the location of the station will determine how many of sea stars you have. The first station, we had loads of starfish! The starfish are randomly collected off of the remaining pile after everyone has been through it for their studies. Out of 4.5 liters (about 5 large handfuls), I counted 340 *Astropecten sp.* I can't imagine how many there really were! With the passing of the stations from each night, the majority species of the pile has shifted from starfish to sand dollars. I'm glad I don't have to count those because there's so many of them. Sand dollars are part of the echinoderm family with the sea stars. I always thought that they were white like you buy them in the beach souvenir shops, but they're a dark purple color when they're alive. Pretty cool! I've got lots of samples to bring home!

With being in the middle of the ocean, you also get to see the big marine life! It was kind of gross, but amazing at the same time! We thought it was a dead whale, but it ended up being a basking shark that has been dead for maybe a week. You could see the decaying

skin, bloated belly, and the now showing gill rakers (the cartilaginous structures that filter

food and sediment out of the gills when the shark eats). We also saw a sunfish (Mola *mola*)! We show a minimovie of one of them as you're going up the moving escalator at Nauticus, but it is so awesome seeing it in real life! It looks like a whale that's been flattened. So cool!



Sunfish (Mola mola)