Opening Remarks Carys L. Mitchelmore, Ph.D. Professor

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Mayor Johnston and distinguished commissioners, thank you for the opportunity to speak with you today to discuss some of the issues affecting Florida's coral reefs. I am Carys Mitchelmore, a Professor and independent scientist at the University of Maryland Center for Environmental Science, Chesapeake Biological laboratory, a leading research and educational institution that works to understand and manage the world's resources.

I am an aquatic toxicologist with over 25 years of experience in scientific research and have published more than 65 peer-reviewed scientific papers, book chapters and technical reports, served on several committees at the National Academies of Sciences, Engineering and Medicine, and testified before Congress and other state and federal regulatory bodies about my research. We currently face huge challenges to protect our coastal and oceanic ecosystems. Thousands of chemical contaminants enter our oceans and so my research expertise is focused on understanding how contaminants and other environmental stressors, interact with and impact organisms, especially sensitive species like corals. I am very concerned about the declining health of our coral reefs and so many of my research projects have studied the impacts of chemical contaminants on a variety of coral species.

Today I would like to summarize the state of the science regarding the impact of sunscreen chemicals, specifically, oxybenzone and octinoxate on corals and present to you results from a recent monitoring project in Hawaii that measured the concentrations of 13 UV filters in seawater, sediment and coral tissue.

In summary there are three main points that I would like to make today:

- Globally corals are in serious decline, major threats are increased temperate and disease.
- There is very limited data on the impacts of oxybenzone and octinoxate on corals.
- Robust scientific studies are needed to determine the risk of these chemicals to corals, so
 that management decisions can prioritize the stressors that are the most damaging to
 Florida's coral reefs.

Thank you again for your time and attention. I hope my presentation today will provide an overview on the current state of the science on the threats to Florida's coral reefs in order to help you make informed decisions about how best to protect them.