April 27, 2018 (E-mail to FORCE)

1. How prepared is FORCE to comply with the monitoring plans required by the regulators?

FORCE's monitoring plans have been in compliance with regulators since 2009. The plans continue to evolve, based on input and feedback from the scientific community, our own advisory committee (with scientific, fishing, and First Nations representatives), and regulators. In terms of the latest communication from regulators, our work to incorporate their feedback is already underway. We agree with DFO and NSE - there needs to be more integration with berth holder monitoring work. It's a good idea. That's already begun in our most recent monitoring report, with the integration of acoustic data collection, to provide a more full understanding of the soundscape of the Minas Passage. We've also integrated Cape Sharp's quarterly monitoring report into our quarterly - this will happen with all berth holders going forward. We're also working on an additional near-field tool with the FAST-2 platform - more on that below.

2. How do FORCE and Cape Sharp intend to comply with the requirement for a contingency monitoring plan?

Contingency mid-field monitoring is something FORCE already has in place for each of our study areas. A contingency monitoring plan for the near-field is also essential, and echoed by our own environmental monitoring advisory committee. This is something Cape Sharp has to finalize before they deploy - you can check with them on status.

3. Am I correct in my interpretation of the NSE letter that FORCE as Approval Holder is being required to take responsibility for developing and implementing near, mid and far-field environmental monitoring and for evaluating and reporting on potential environmental effects? (I think the NSE letter is pretty clear about this, but I ask because as I understood things previously, Cape Sharp was responsible for monitoring in the near-field around the turbine, while FORCE conducted the monitoring further away from the turbine. It seems to me that NSE is imposing further responsibilities on FORCE as Approval Holder.)

Yes, that's correct. We've always held responsibility for overall monitoring at

the site - and that monitoring has a high degree of input from others - the international scientific community, as well as review by the environmental monitoring advisory committee as well as regulators. The actual work of monitoring - design, data collection and analysis - is conducted by our own ocean techs along with academic and research partners, including the University of Maine, the Sea Mammal Research Unit Consulting (Canada), Envirosphere Consultants, Acadia University, Luna Ocean Consulting, JASCO Applied Science, Ocean Sonics, GeoSpectrum Technologies Inc., and Nexus Coastal Resource Management.

We expect Cape Sharp (and any future berth holders) to continue their role in ensuring near-field monitoring is happening, just as we expect our other research teams to conduct their studies: practically, berth holders have to be responsible for ensuring their devices are equipped with sensors - that has been and still will be the case.

But we understand NSE's directive as ensuring FORCE will take a greater stewardship role in each berth holders monitoring planning, execution, and reporting - and we think that's a good idea. That work has already begun - with the most recent monitoring report, with our marine sound analysis, and also with our upcoming FAST-2 work - the platform is currently in trials to test directional sensors to collect data from near-field targets, including the face of a turbine. Sensors on FAST-2 currently include a Tritech Gemini imaging sonar, dynamic mount to position the sonar, and subsea cabling to allow for real-time data collection. Testing began March 22nd, 2018, between the FORCE beach and Black Rock.

Matthew Lumley
Communications Director
Fundy Ocean Research Centre for Energy (FORCE)