

A British LR5 mini-submarine is unloaded from an aircraft at the airport in Trondheim, Norway, en route to the Barents Sea

Design limits communication

While the design of the submarine -- double-hulled with three feet of separation between the inner and outer hulls -- affords protection from torpedoes and sea mines, the analysts say it also makes it particularly difficult for tapped messages from within the ship to be heard outside.

Russian accounts of the incident and details made public have regularly changed since the start of the episode.

The U.S. official said that analysts accept that, in theory, the Kursk crew could have survived and may still be alive.

"If there was no break (in a sealed compartment holding crew members), the oxygen would hold out until Friday," the U.S. estimate suggests.

There is, however, no significant evidence that leads analysts to believe that crewmen may still be alive and awaiting rescue, U.S. officials said.