

International Lunar Conference 2003, Hawaii Island, Hawaii  
Pacific Space Access, Advanced Space Technologies

Nikolai V. Abrosimov  
Director and Chief Designer  
LLC MARENGO, Russia  
Contact tel. No + 7-(8-902)-125-7276  
[slavfox19@yahoo.com](mailto:slavfox19@yahoo.com)

Theme: UNIVERSAL EARTH-SPACE-EARTH TRANSPORTATION SYSTEM OF LARGE  
CARRYING CAPACITY

LLC Marengo has cooperatively developed a project of environment friendly universal Earth-Space-Earth transportation system (UTS) with carrying capacity of up to 60 tons capable to deliver cargoes to the baseline circular orbit of 200 km height.

UTS consists of the following major elements: a boosting platform on the basis of Ekranoplane and an aerospace craft.

The project has been developed with the application of technical solutions and scientific and technological potential currently available in Russia as well as several universal transport subsystems already tested in flight conditions. Certain project solutions have been developed in order to sufficiently increase the reliability of the launching system in comparison to the same characteristics of existing space transportation systems.

In case of successful implementation of the project, a new launching system will be capable at low costs to support nearly any cargo flow from the Earth to the Space and back to the Earth, including large-dimension cargoes. That will allow to give effect to and develop certain perspective and existing commercially oriented and space programs.

The project can take about 8 - 9 years to be implemented at a general cost of approximately 17 - 18 billion US dollars (at current prices). While estimating the project cost it was taken into account the creation of 4 - 5 functional flight sets of the launching system and the whole infrastructure for its maintenance, including construction of a launching technical complex near the Line aimed to serve up to 50 - 60 flights per year.

The project is offered to be implemented and further commercially operated by means of international co-operation, considering that such implementation will bear a minimum technical and financial risk, which is nearly absent.