



FLNG GLOBAL

FSRU BENEFITS VS ONSHORE SOLUTIONS, COMMERCIAL ALTERNATIVES & TPA REGULATIONS



Tadas Matulionis

Director of LNG terminal

May 2017

KN – an oil product and LNG terminal operator

Traditional business



50+ years of oil product terminal operations



State fuel reserves terminal

Focus for strategic expansion – development, construction and operations of LNG terminals



Klaipeda LNG terminal based on FSRU
Independence



LNG reloading and bunkering station under
construction in Klaipeda



LNG transport and bunkering vessel project for
the Baltic Sea



LNG terminal development
and Advisory services

KN long term strategy is to develop, construct, own and operate LNG terminals globally

Klaipeda small-scale LNG station (under construction)



Colombia LNG terminal (advisory) – project successfully completed



Klaipeda LNG terminal (operational)



LNG bunkering vessel (under construction)

































Project in Southeastern Europe (development)

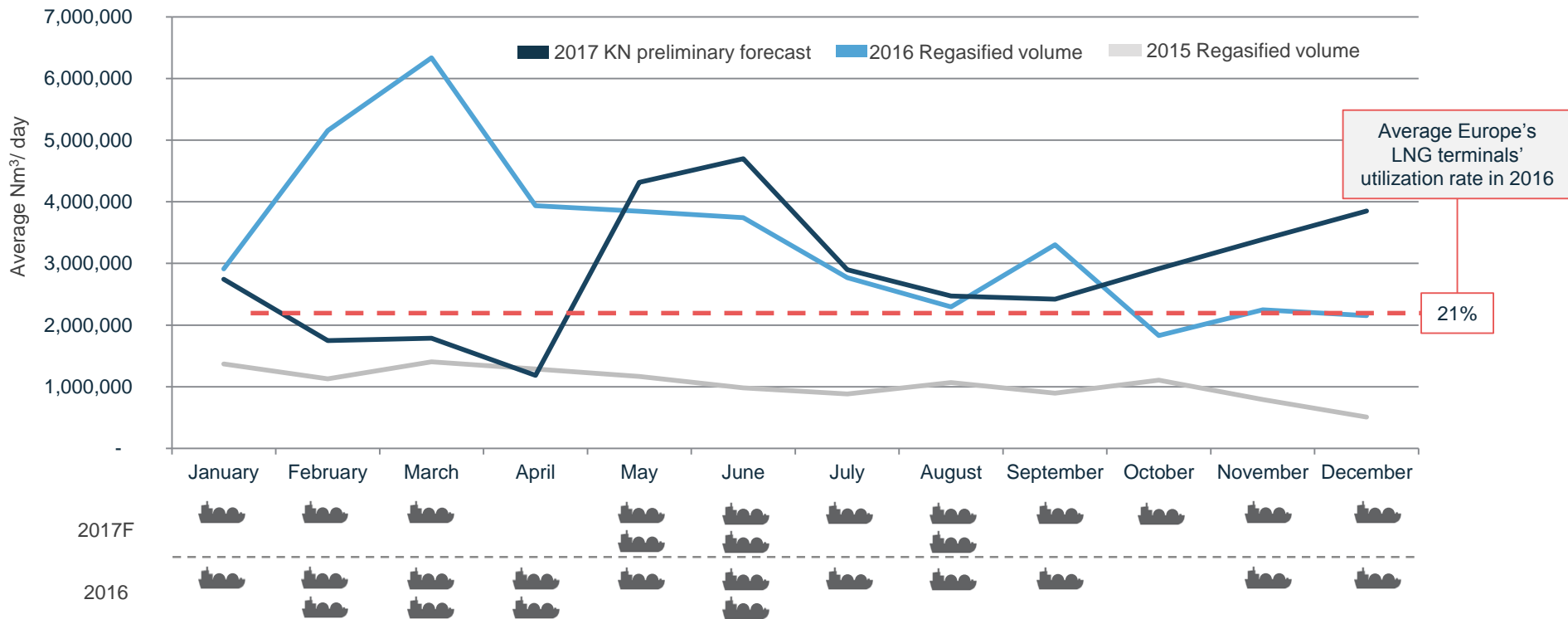


Utilization of Klaipeda LNG terminal rises

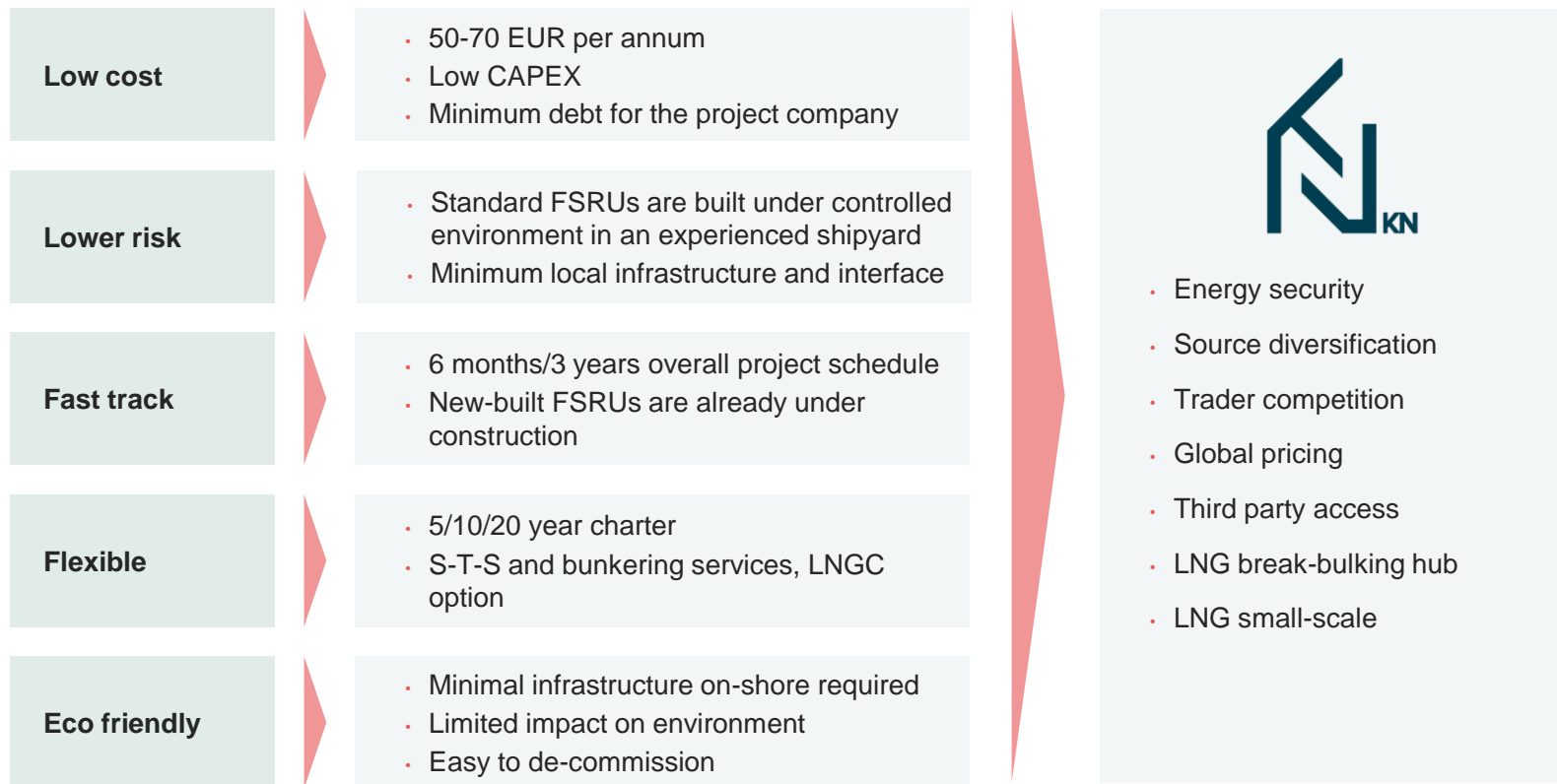
Forecast

	2015	2016	2017	2018/2020
Natural gas supplied, bcm	0.5	1.3	1.0	N/A
Capacity utilization	10% - 15%	30% - 90%	25% - 90%	N/A
Terminal users	 LITGAS	 LITGAS  LIETUVOS DUJOS tiekimas  <small>MEMBER OF THE EUROPEAN GAS GROUP</small>	 LITGAS  LIETUVOS DUJOS tiekimas  <small>MEMBER OF THE EUROPEAN GAS GROUP</small>	 LITGAS  LIETUVOS DUJOS tiekimas  <small>MEMBER OF THE EUROPEAN GAS GROUP</small>  BOMIN LINDE LNG
Access to regas markets	 	 	   	     
LNG suppliers	 Statoil	 Statoil	 Statoil  KOCH	 Statoil
Operational regime	Energy security	Energy security Commercial regas	Energy security Commercial regas Commercial reloading	Energy security Commercial regas Commercial reloading Commercial truck loading

Klaipeda LNG terminal: Utilization rate in 2016 - 31%, higher than Europe's average



Rationale for selecting FSRU technology





Klaipeda LNG terminal: Joint use of LNG at the terminal (SWAP) principles

Advantages of joint use of the terminal:

- More than one terminal user.
- Enables small scale
- Flexibility in accepting cargoes and rendering services.
- Accessible for smaller traders and smaller regional markets

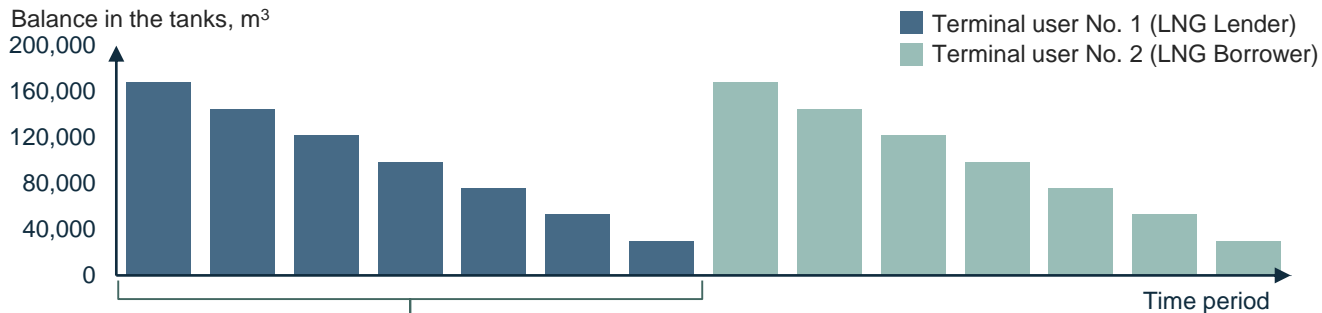
Previous regulated SWAP

- Up to 60 days cargo storage requirement

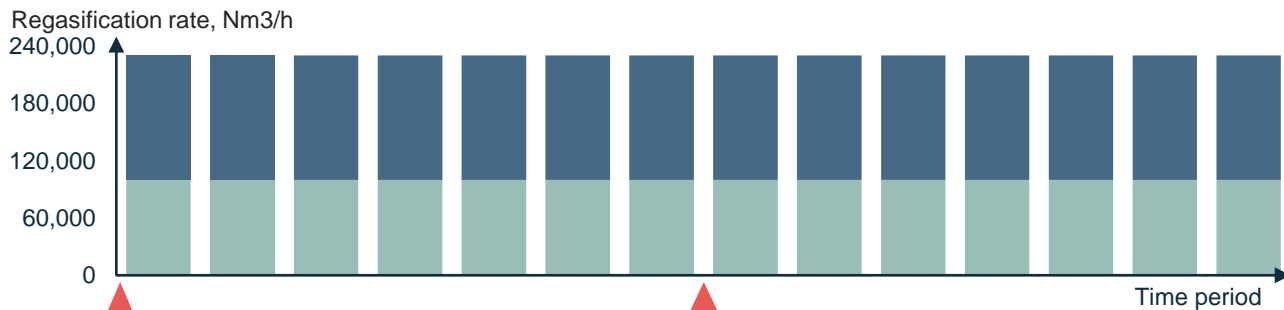
New regulated SWAP

- Up to 365 days cargo virtual storage allowance and up to 60 days physical cargo storage

Example of joint use of the terminal



Up to 365 days cargo virtual storage allowance
and up to 60 days physical cargo storage



Terminal user No. 1 delivers LNG and lends part of it

Terminal user No. 2 delivers LNG and returns it

Undergoing development of small-scale LNG value chain in Klaipeda



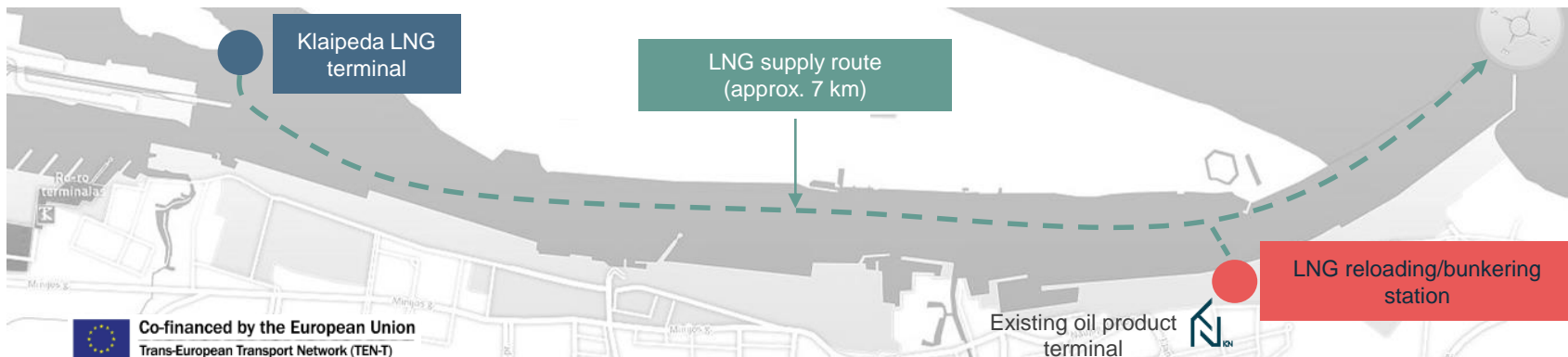
FSRU Independence



LNG transportation vessel



LNG reloading/bunkering station



Co-financed by the European Union
Trans-European Transport Network (TEN-T)

LNG Reloading Station to be launched by mid-2017

Some of the technical parameters of the LNG reloading station

Volume of LNG storage tanks (from appr. August 2017)	2 x 1.000 m ³
Volume of LNG storage tanks (from appr. January 2018)	5 x 1.000 m ³
Maximal LNG filling level	90%
Station's annual technological capacity (from January 2018)	250.000 m ³
LNG truck loading rate	60-100 m ³ / hour
Number of truck loading bays	2 bays
Maximal number of LNG loaded trucks per day (from January 2018)	24 trucks
Length of the jetty	250 m
LNG bunkering rate	250-500 m ³ / hour

Construction site in April, 2017



29

Ship-to-Ship transfers performed

Small-scale LNG carriers

Being filled from FSRU Independence since January 2017.

First continuous reload

from FSRU type terminal in small-scale LNG market.

Multi-user and multi-service

Terminal mode for the first time

Coral Energy, by Skangas, berthing at Klaipeda LNG terminal



Our value





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