

ROSAVIATSIYA

Federal State Unitary
Enterprise

“State ATM Corporation”



Branch of

North-East Air Navigation

About Us

- State ATM Corporation Branch of North-East Air Navigation
- More than 45 thousand flights annually
- More than 5,7 million square km of air space
- 14 units in the territory of Magadan Region and Chukotka Autonomous Area over Russian Far North-East
- More than 800 employees

About the Branch



Consolidated Magadan ACC



Consolidated Magadan ACC Operation Room



Air Space Structure of the Branch

Consolidated Magadan ACC air space structure

Sector “South”

Sector “North”

Sector “North-1”

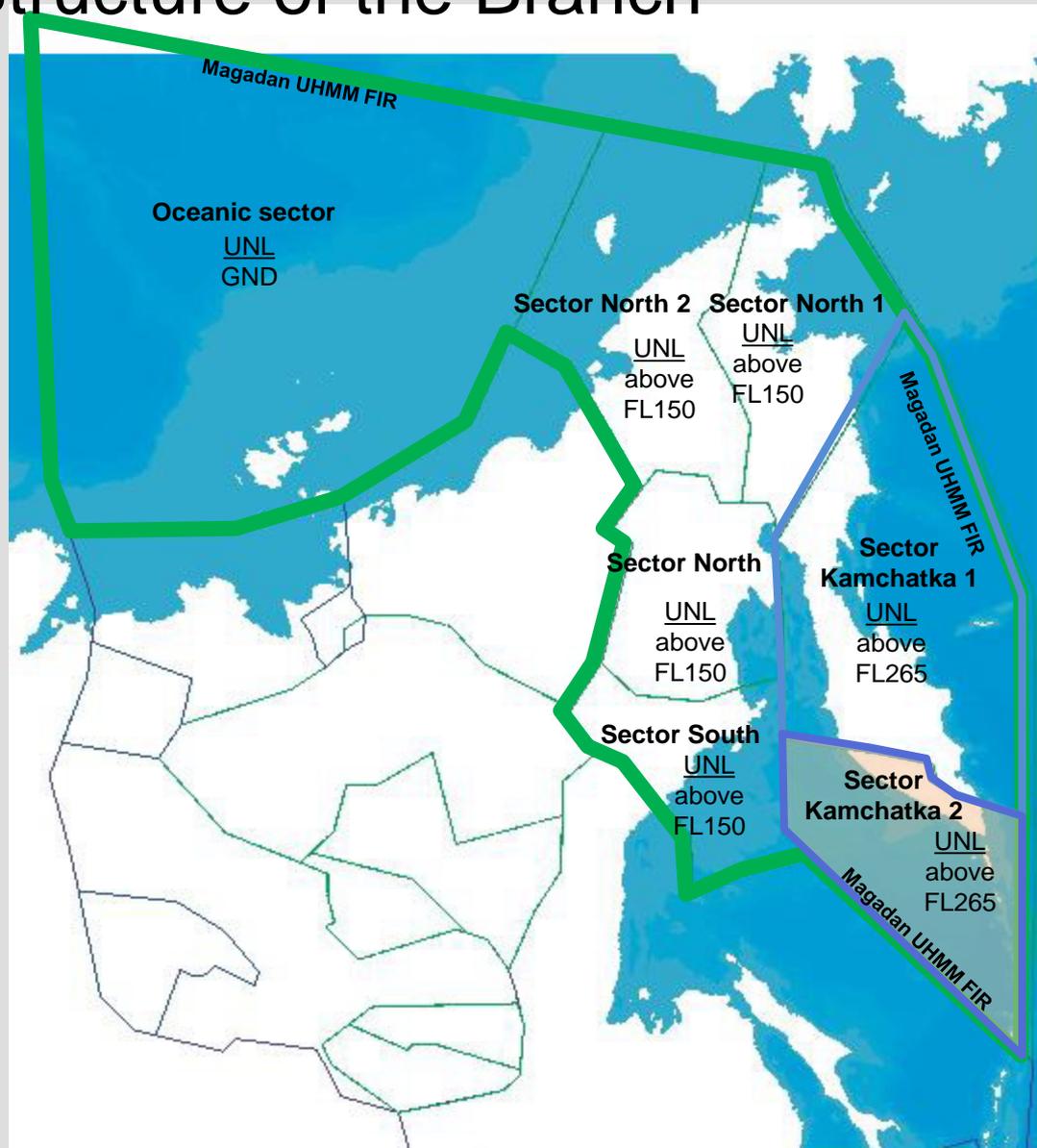
Sector “North-2”

“Oceanic” Sector

Sector “Kamchatka-1”

Sector “Kamchatka-2”

since November 10, 2016



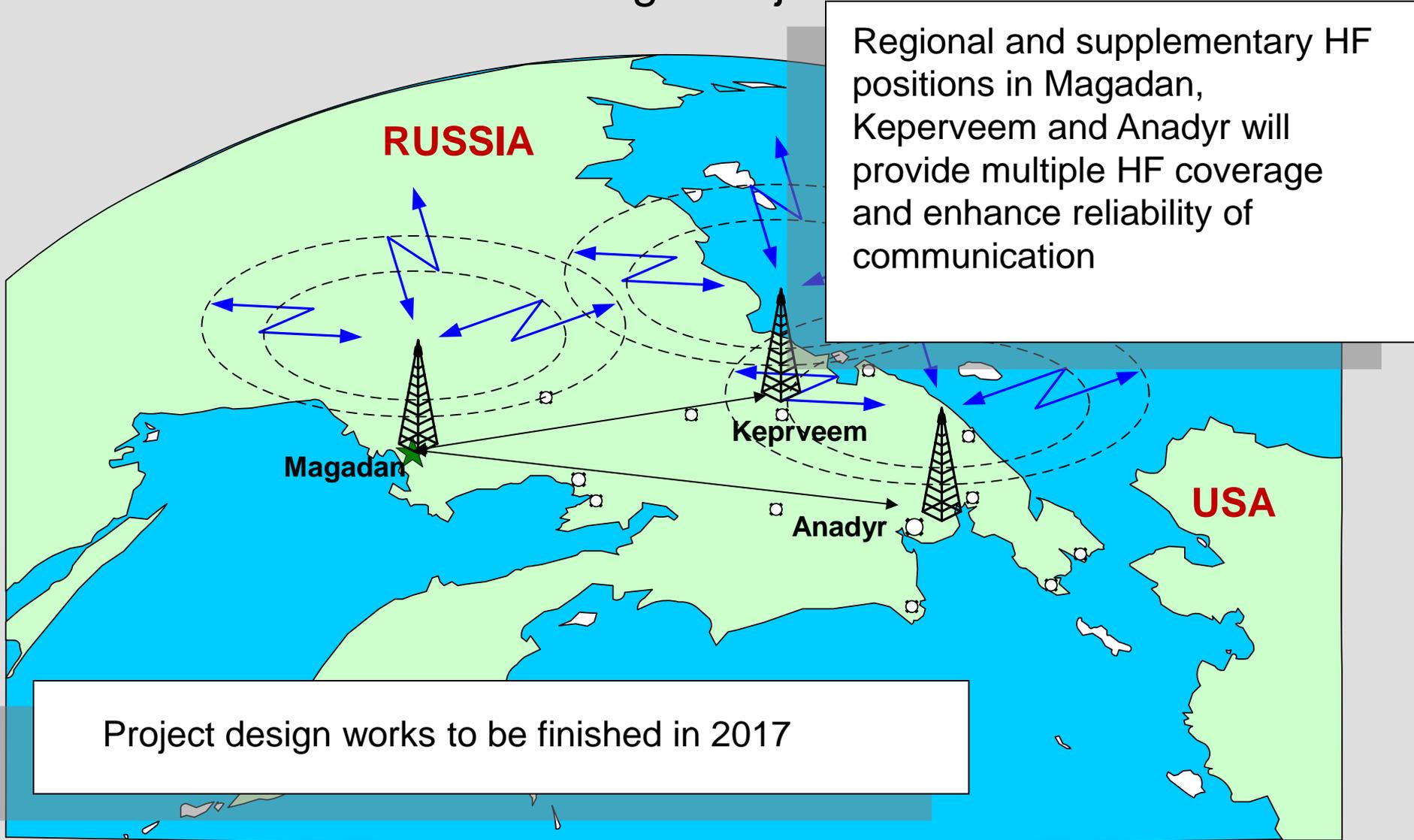
New HF Facilities of Consolidated Magadan ACC



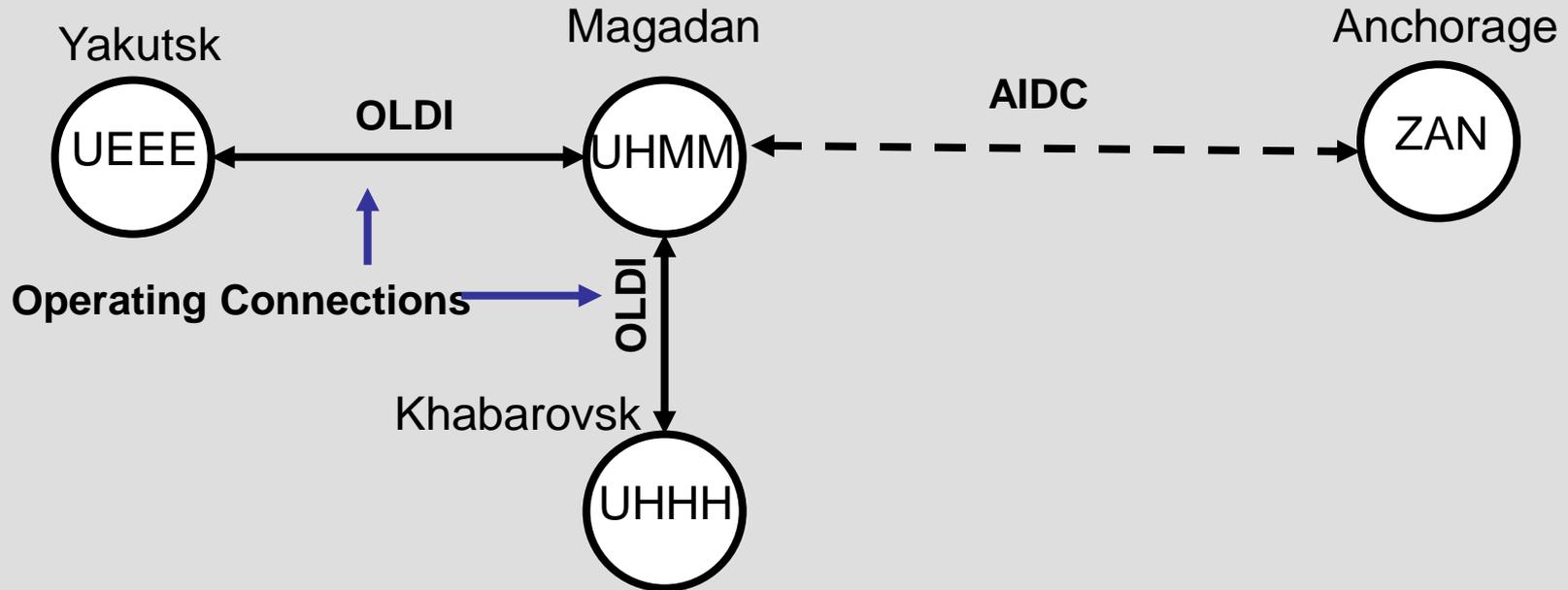
New HF transmitting centre of Magadan Consolidated ACC



Regional and Supplementary HF Communication Centers Design Project



ATC Interaction Through AIDC

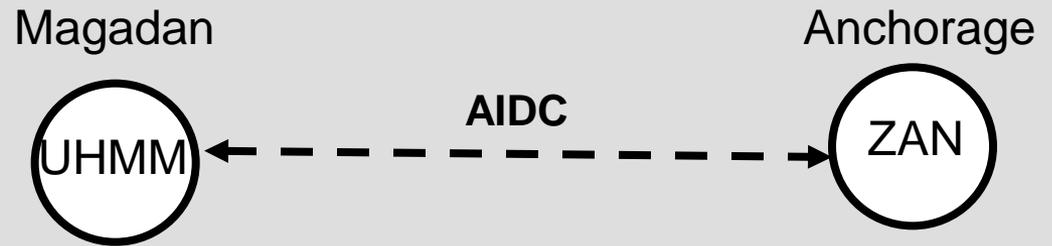


✓ European standard voiceless OLDI interaction between Consolidated Magadan, Yakutsk and Khabarovsk ACCs is now provided.

ATC Interaction Through AIDC

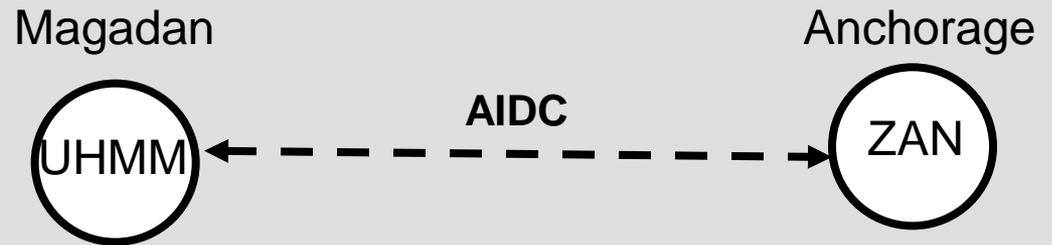
To interact with Anchorage:

- ✓Asia-Pacific interface specification version 3.0 is supposed to be used
- ✓AFTN Network is planned to be used for transmitting AIDC



- ✓Rosaviaasia has approved the agreement to improve Magadan ACC automated ATC System for providing interaction with Anchorage ACC through AIDC.
- ✓The works are planned to be completed in the second part of 2017.

ATC Interaction Through AIDC



According to the Agreement:

- ✓The Design Project is to be worked out;
- ✓Consolidated Magadan ACC automated ATC System software and hardware are to be upgraded;
- ✓Intercommunication between Magadan and Anchorage is to be arranged;
- ✓User acceptance testing is to be provided.

Use of ADS-C/CPDLC at Consolidated Magadan ACC

The screenshot displays the ATIS system interface for the Consolidated Magadan ACC. The main window shows a map of the region with flight paths and aircraft positions. Several windows are open, providing detailed information:

- Aircraft Message History:** Shows messages for CSN399/B-2049, including "Aircraft active", "POSITION REPORT [60°30.9'N 145°44.8'E] [23:51] [F310], NEXT FIX [BAGES] [23:52], FIX NEXT+1 [OSMER], DEST TIME [08:41], TEMP [-46C], WINDS [2/11 K], SPEED [0.84 MA CH], WAYPOINT [SONAG] [23:46] [F310]", "MAINTAIN [F310] REPORT PASSING [TUBKI]", and "WILCO".
- CPDLC v1.4 (LINK UP):** Shows a list of active aircraft:

Aircraft	Link Up	Active
AA187 / N805AN	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
CAO1001 / B-2475	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
CAO1018 / B-2091	<input type="checkbox"/>	<input type="checkbox"/>
ACA031 / C-FIVM	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
CSN399 / B-2049	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
UAL895 / N798UA	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
- CPDLC v1.4 (Control Panel):** Shows various control buttons for communication, including EMG, ADV, OTH, EXP, and CTM.
- Weather Data:** Shows current conditions: "10/28 10:00 10:00 T: 0°C Td: 7°C Влажн: 60%", "QNH: 1010 1:210 0:000 MID: 28", "hpa Wind 160 Vis 9999", "1012 mps 4 RVR 0000", "mm gust 5 Cld 1080m 8/5 CB", "759 cros 4.2 0FEmm/hpa 744 /993", "TRENД: NOSIG".
- Flight Paths:** Shows various flight paths and waypoints, including "Север-1 133.0", "Юг 136.6", "П-Камчатский 135.4", and "Подход 119.3".

New Radar Position in Providenia Bay

To arrange new radar position in Providenia there had been:

- ✓Krona-M MSSR (mono-pulse secondary surveillance radar) purchased (manufactured by NIIT-RK);
- ✓Radar position project worked out;
- ✓Construction Agreement signed.



Position is planned to be put into operation in 2017.

New Radar Position in Providenia Bay



**Providenia Airport view from Beklemishev mountain top
chosen for construction of a new radar position**

New Radar Position in Providenia Bay



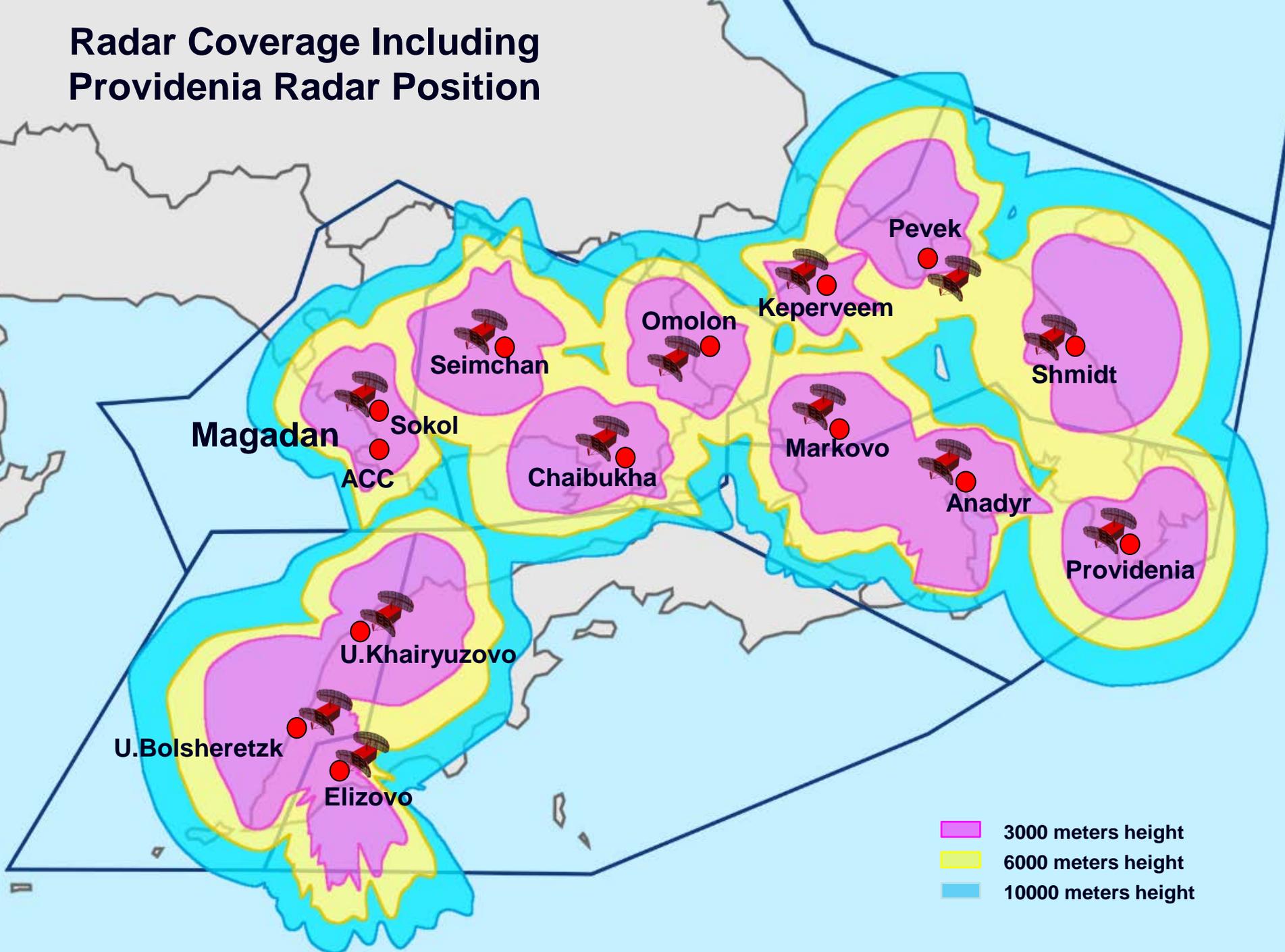
Early stage of the New Radar Position

New Radar Position in Providenia Bay

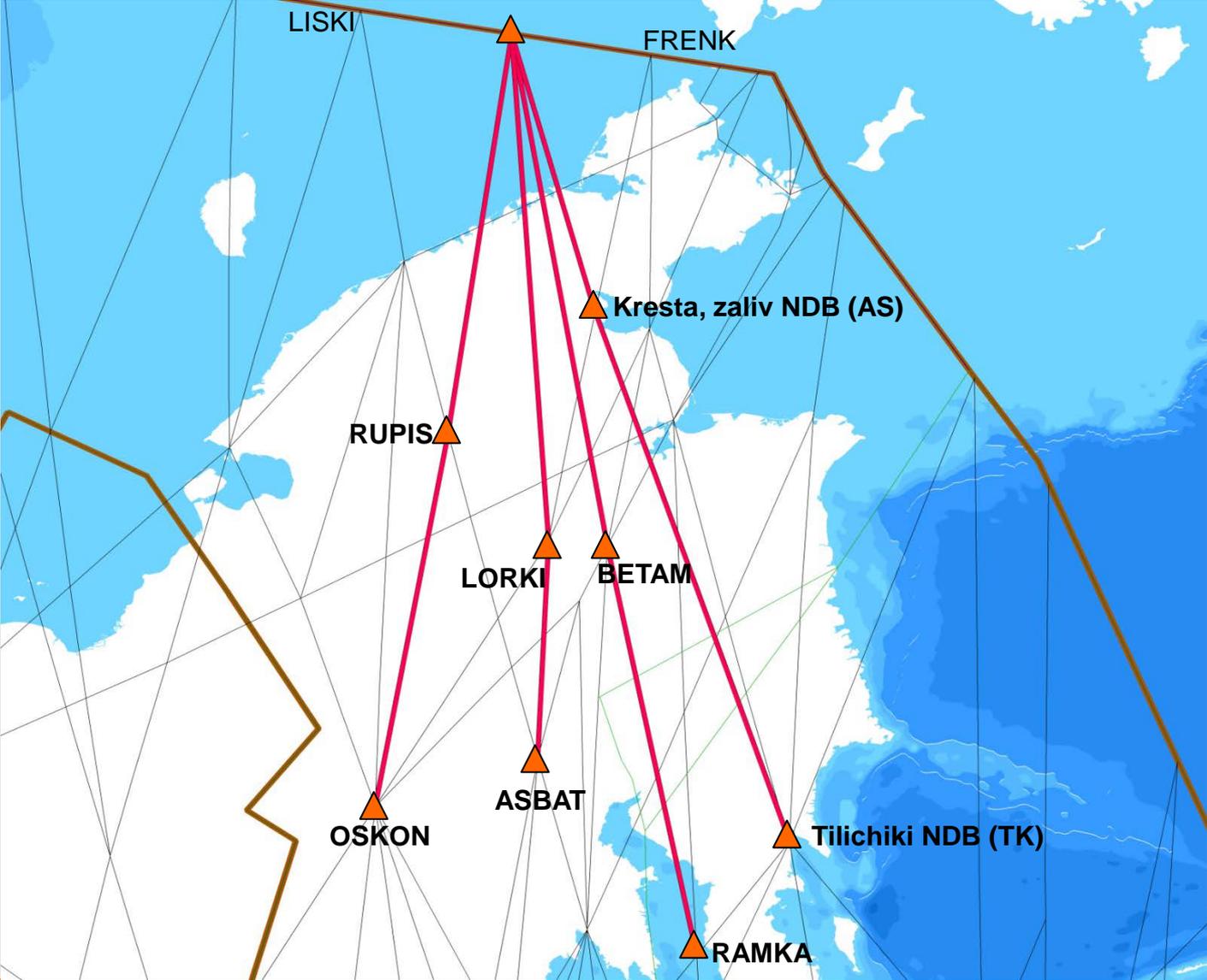


Laying of the foundation of New Radar Position

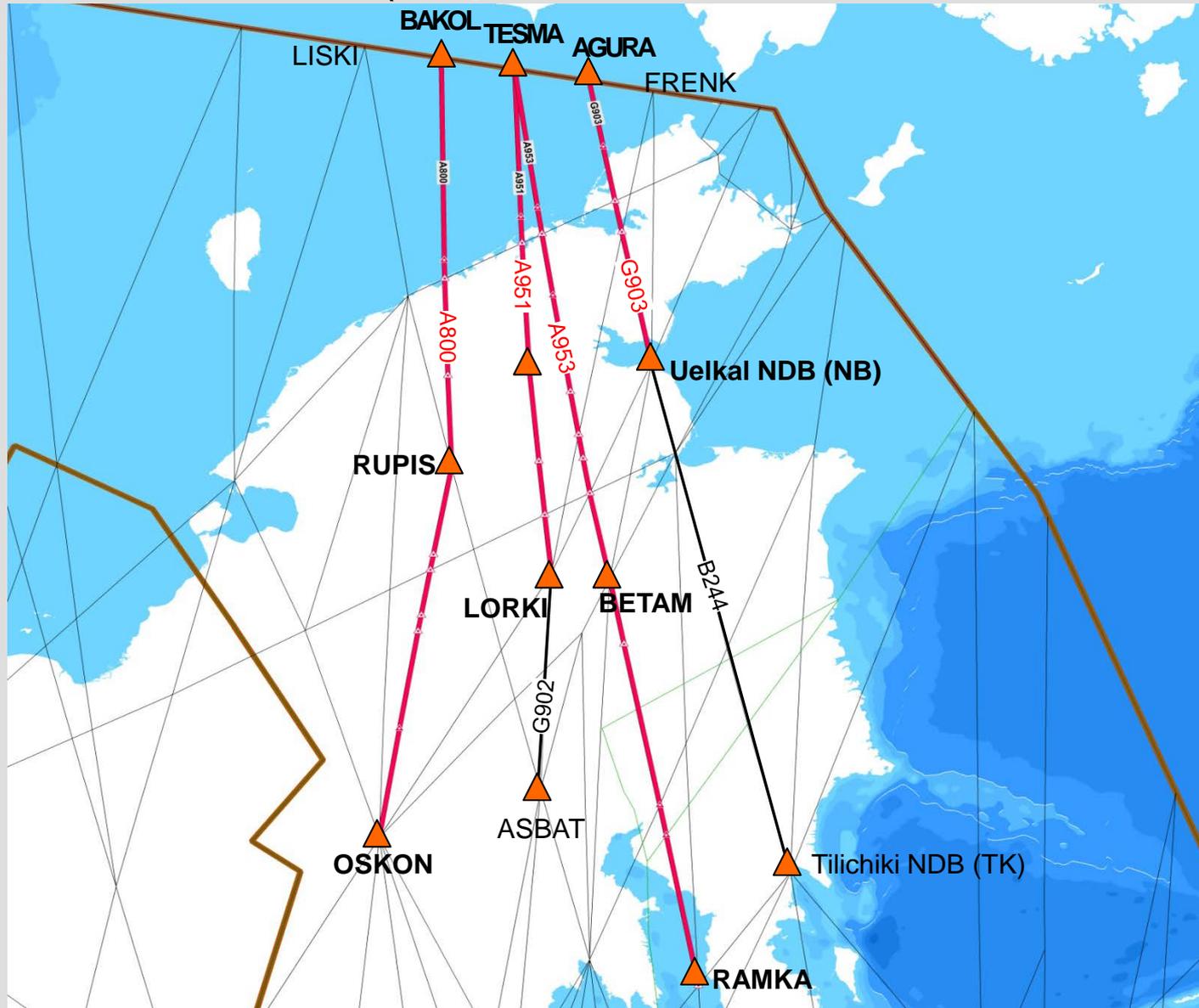
Radar Coverage Including Providenia Radar Position



United Airlines Proposals on New Air Corridor between FRENK and LISKI



New ATS Routes (the planned effective date February 02, 2017)



- Thank You!
- Questions/Discussion