

Safedock Upgrade and Expansion Project - C800779

Commission

February 13, 2018

What is Safedock?

- Visual docking guidance and ramp information display.
- Guides pilot to nose stop saving fuel & reducing congestion.
- Scans ramp area for obstacles to aircraft docking.
- Docks planes following adjacency rules and can dock without personnel (unavailable ground crew, bad weather...).

What is Safedock?



Display, video camera and lasers.

Mounted on/near stairwells, on buildings, on posts, or on jet-bridges.

Connected to power and network.

What it Looks Like

Why Is It Needed?



Near Miss

Jet Engine Damaged by Truck



Actual Collision

Safedock History at SEA

First Airport in US to install Safedock

- 2005-2007 Delta Airlines realignment on Concourse A
- 2007 Alaska Airlines trial on D1-D4
- 2012 American Airlines realignment on D7-D9
- 2015 Alaska Airlines safety measure for tight gate space
- 2016 Plan to upgrade old and expand to more gates
- 2017 NSTAR includes Safedock at all gates at NSAT

How We Got Here

Safedock Initiatives at North American Airports

- Miami 18 expansion
- Atlanta (Delta gates) 155 new
- Toronto 152 expansion
- LaGuardia 41 new
- San Francisco 41+ new
- Chicago 10+ expansion
- Los Angeles 28+ expansion

We Are Part of a Trend

Recommended Plan

- Airport-Wide advanced Safedock units
 - Larger Pilot/Ground Crew Ramp Information Display
 - Video Cameras
 - Obstacle Scanning & Alerts
 - Leverage IAF project by procuring units they install
 - Complete the installation of Safedock units airport-wide for operational consistency
- Gate Operating System
 - Leverage data for operations and gate usage analysis
 - Link to other systems

Plan: Airport-Wide Units and Gate Operating System

Why Airport-Wide?

- Airlines Support:
 - Delta's General Manager, Corporate Real Estate request
 - International Carriers request
 - Icelandair, Virgin Atlantic, British Airways, Lufthansa, ANA and Emirates.
 - American Airlines support their gates
- North Satellite is installing units on all gates
 - Standardizes Safedock units at all Alaska gates
- Airport-wide deployment creates consistency in operations

Installation Justification

Cost and Schedule

- **Cost**

Advanced units with cameras & scanning + GOS + interfaces + infrastructure + installation

= \$29,200,000

- **Schedule**

- Commission Authorization for Design, GOS, IAF units Q1 2018
- Commission Authorization for Construction Q1 2019
- Substantial Construction Completion Q1 2020

How Much / How Long