



e-flight-forum

Subject 3 - Unusual Configurations and Safety Systems

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Chief Operating Officer – VerdeGo Aero

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Beijing China

# VerdeGo Aero Mission

Transform short-haul commercial aviation



VerdeGo Aero is developing the **PAT200 VTOL aircraft**

The PAT200 addresses the multi-billion dollar market for time-sensitive on-demand transportation in congested urban areas

# VerdeGo Aero PAT200

The next generation of short-range VTOL aviation \*Patents pending

- ✓ Hybrid Electric
- ✓ Helicopter-type Rotors
- ✓ Optimized for Quietness
- ✓ Redundant Drivetrain
- ✓ Autonomous



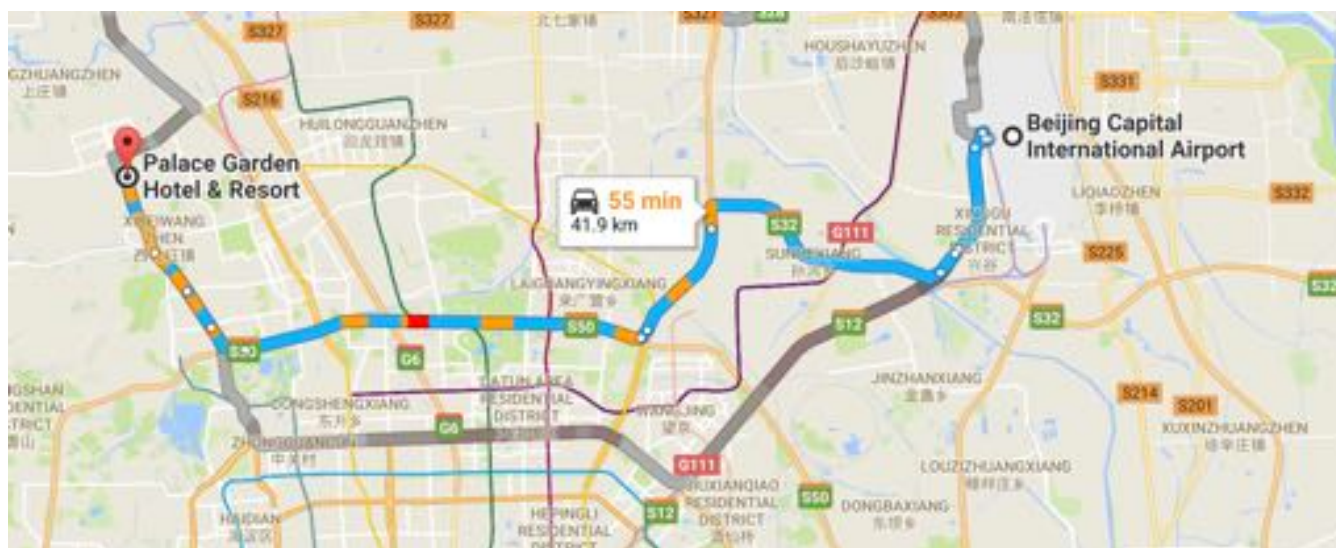
**Quiet** – ¼ of the noise of a helicopter

**Cost Effective** – parity with premium ground transportation

**Safe** – Fully redundant systems



# VerdeGo PAT200



**VerdeGo**  
10 minutes  
26 km  
>200 kph  
No traffic variability



**Car**  
60 - 120+ minutes  
59 km  
60 kph average  
Varies by 1 hr+ for traffic

# Founders

Comprised of established aviation pioneers and visionaries



## Erik Lindbergh

President



- Director XPRIZE Foundation
- Influenced the launch of the private spaceflight industry
- Electric flight pioneer
- 75<sup>th</sup> anniversary commemoration of Charles Lindbergh's 1927 transatlantic flight

## Pat Anderson

Chief Technology Officer



- Director of Eagle Flight Research Center at Embry-Riddle
- Specializes in new vehicle concepts, controls, electric & hybrid power
- Led world's first piston engine/electric hybrid aircraft program
- Pilot with ATP, Instructor, and A&P ratings

## Eric Bartsch

Chief Operating Officer



- General Management experience at \$250M + businesses
- Experience leading flight testing and demo teams with electric aircraft
- Co-founder of Powering Imagination to promote clean, quiet electric flight
- Pilot with Commercial, Glider, and Electric flight experience

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# VerdeGo Heritage

At the forefront of developing, flying, and certifying electric & VTOL aircraft



VerdeGo Aero's founders have a long track record of developing, flying, and certifying new aerospace technologies

**Manned Hybrid Aircraft**



Leadership of **hybrid-electric consortium**



**Quiet Flight Initiative**



Next gen **battery management system** development



**VTOL – fixed wing hybrid drones – multiple configurations**



**Multi-Rotor VTOL testbed**



# VTOL vs. Conventional Aircraft



\*Pipistrel Alpha Electro

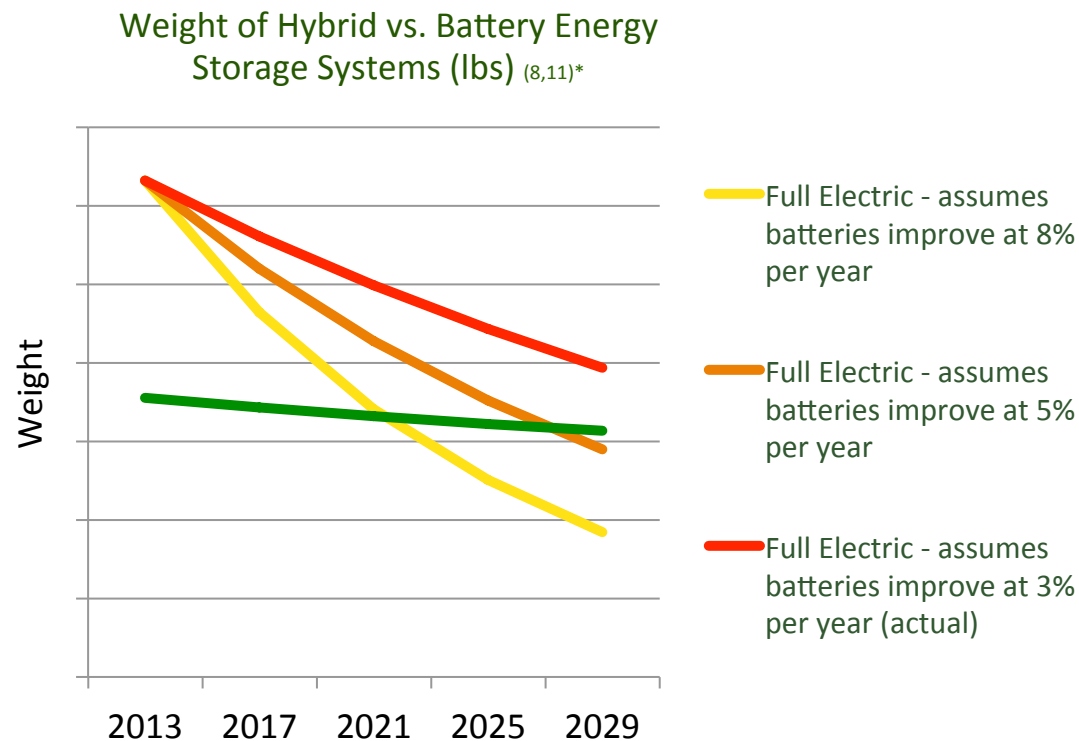
Short Range Urban Aircraft (SRUA) have unique challenges vs. conventional aircraft

- VTOL Power Requirements
- Safety of Urban Operations
- Certification

# VTOL Power Requirements



- The high power requirements of vertical flight make VTOL electric systems much more challenging than fixed wing aircraft
- The challenge isn't making an electric VTOL aircraft fly, it's making the aircraft useful
- Batteries are NOT improving at the rate we need them to and significant progress will be unpredictable





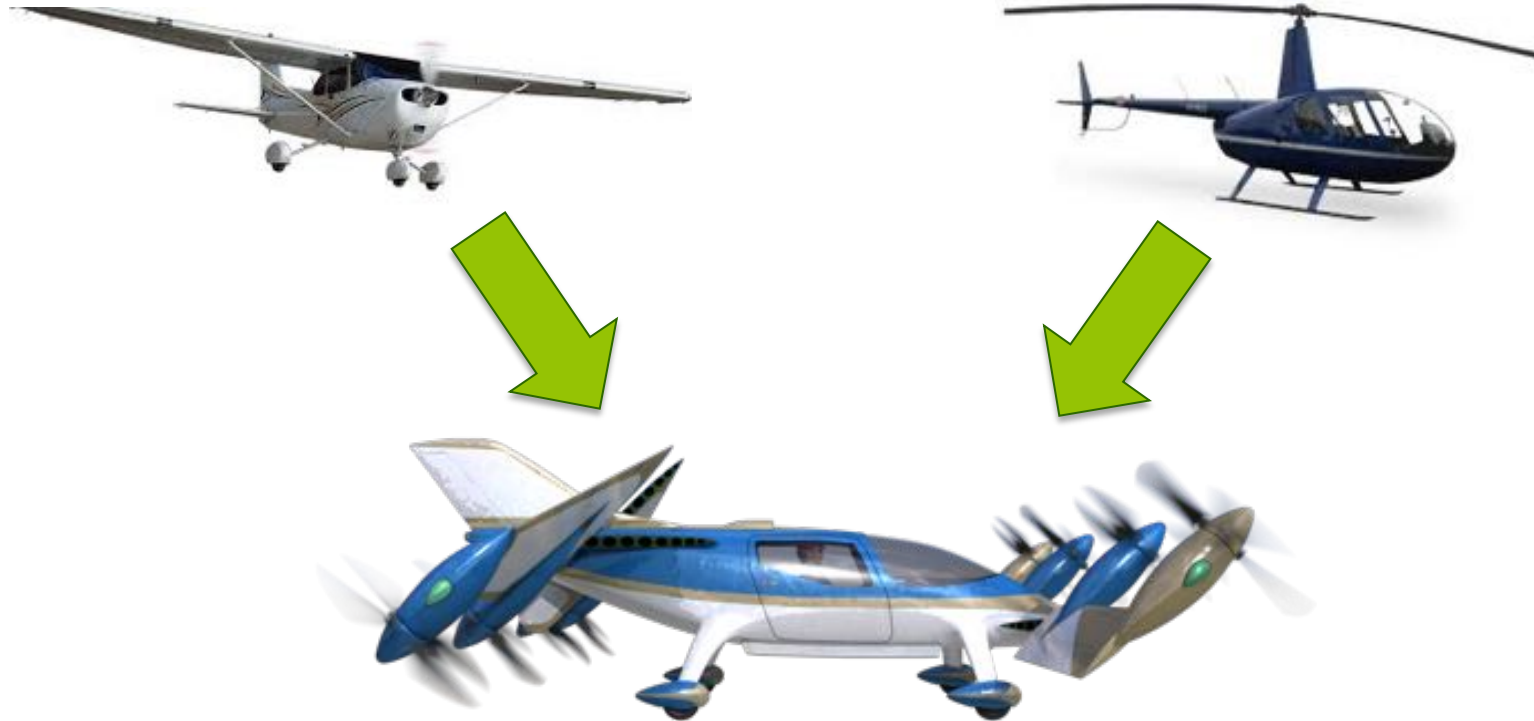
# Safety of Urban Operations



The unique operating environment for Short Range Urban Aircraft (SRUA) must be considered

- Low Altitude
- Congested Areas
- Urban Environments

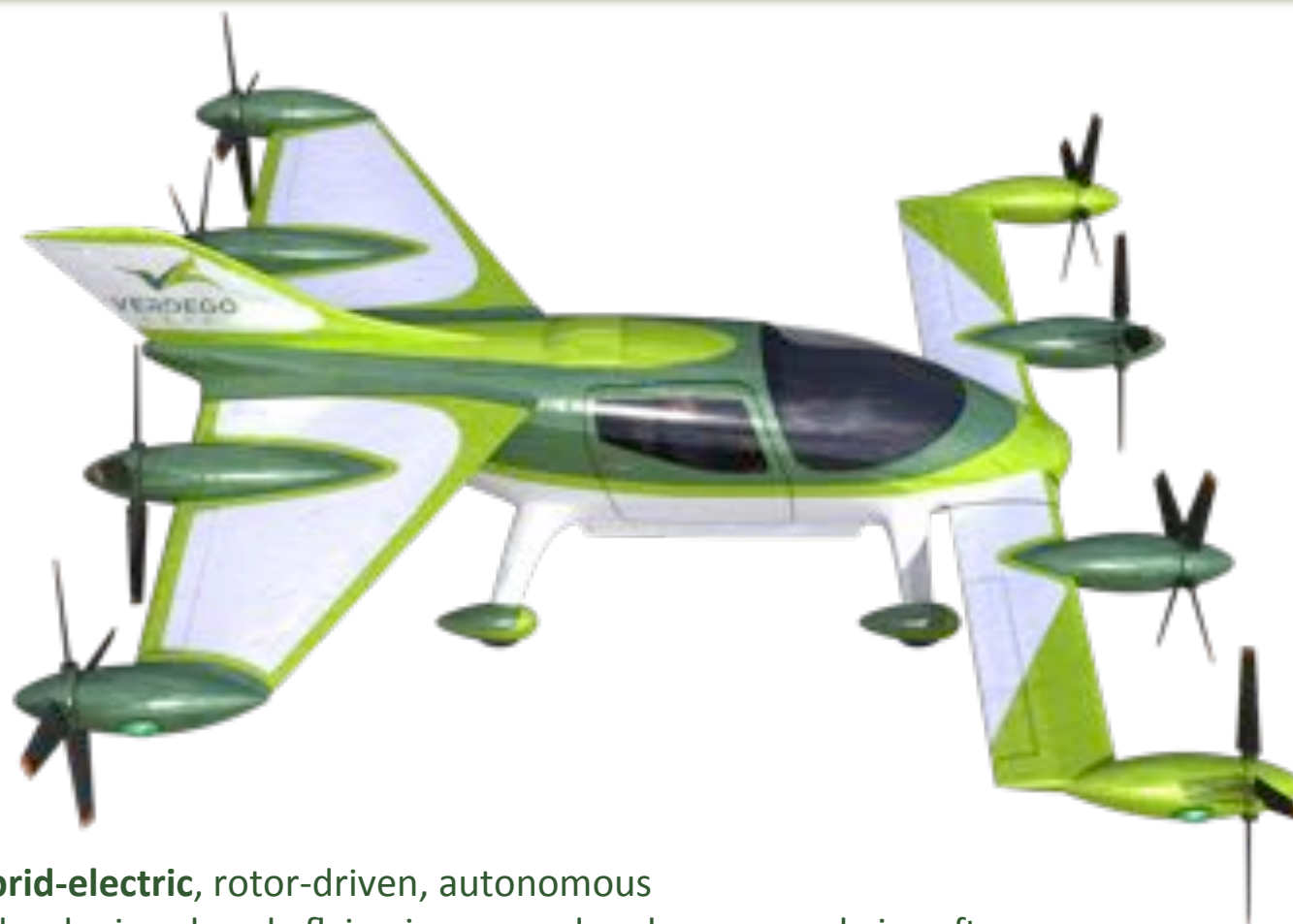
# Certification



SRUA must be demonstrated to be safe and must comply with evolving regulatory requirements

# VerdeGo Aero

Making short-range commercial aviation a reality!



- ✓ **Hybrid-electric**, rotor-driven, autonomous
- ✓ Technologies already flying in manned and unmanned aircraft
- ✓ **Redundant safety systems for all phases of flight**
- ✓ Extensive experience with electric flight, VTOL, and **certification of new technologies**