INTRODUCING THE

WENDY SCHMIDT OCEAN HEALTH XPRIZE®

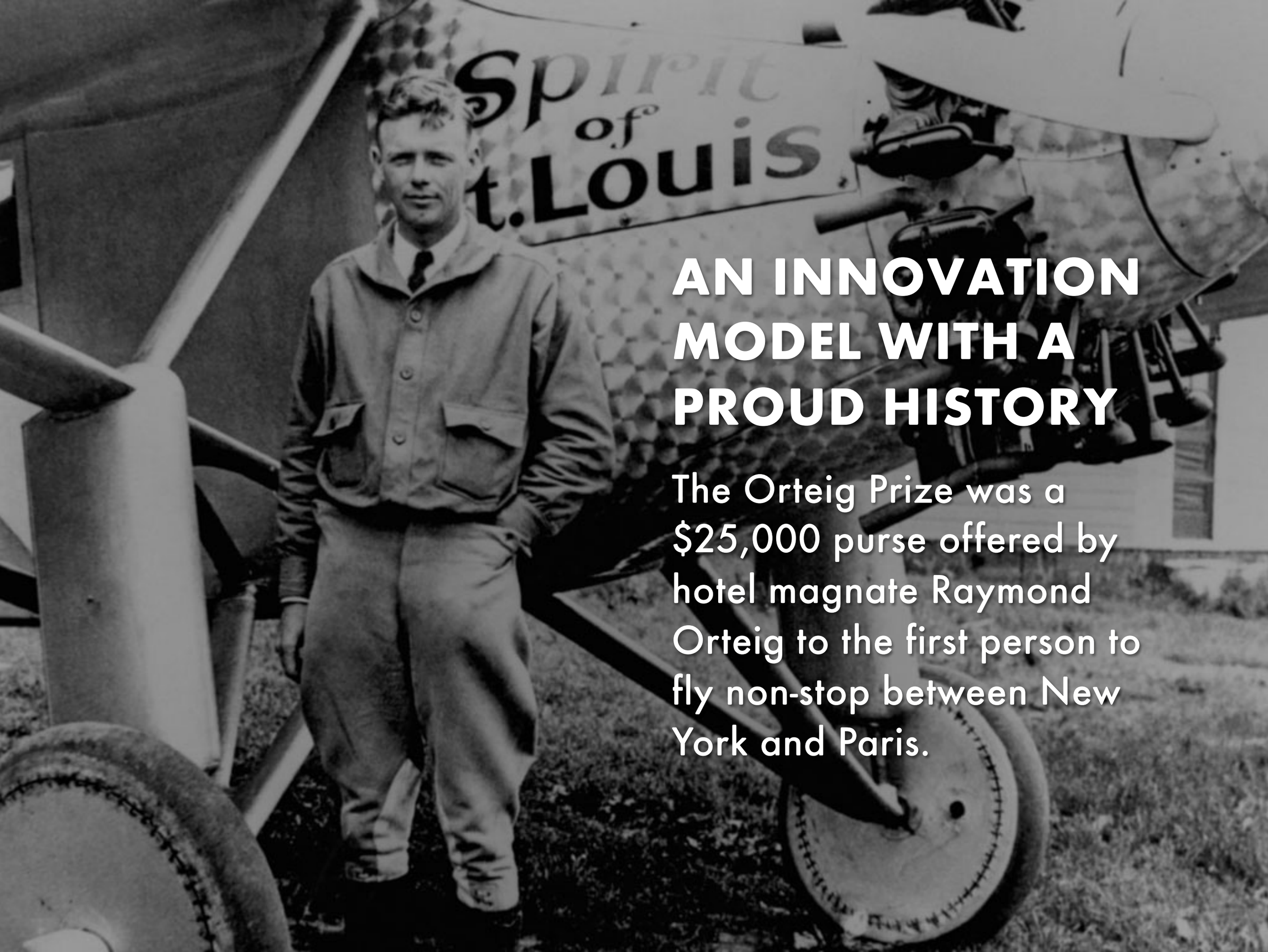
CONTENTS

1. Introduction to XPRIZE
2. Introduction to the Wendy Schmidt Ocean Health XPRIZE
3. Prize Purses
4. Competition Structure
5. Goals and Impact

THE XPRIZE FOUNDATION DRIVES INNOVATION AND INSPIRES THE BELIEF THAT WE CAN CREATE A BETTER FUTURE. OUR PRIZES TARGET GRAND CHALLENGES AND MARKET FAILURES BY DEFINING LARGE PROBLEMS AND INCENTIVIZING COMPETITION TO DRIVE RADICAL BREAKTHROUGHS THAT BENEFIT HUMANITY.

XPRIZE®

THE ANSARI XPRIZE BEGAN WITH $2.5M IN SEED MONEY AND A $10M PRIZE PURSE, WHICH LED TO $100M IN RESEARCH AND DEVELOPMENT, YIELDING A $1.5B PRIVATE SPACE INDUSTRY.



AN INNOVATION MODEL WITH A PROUD HISTORY

The Orteig Prize was a $25,000 purse offered by hotel magnate Raymond Orteig to the first person to fly non-stop between New York and Paris.

PRIZES ARE POWERFUL TOOLS FOR INNOVATION

Prizes pay only for successful outcomes

- Traditional R&D expenditures involves spending money upfront

Prizes provide significant financial leverage

- For every dollar of prize purse, the aggregate competitor R&D spend is often > 5x the prize purse

Prizes encourage new approaches to solving grand challenges

- Prizes engage untouched populations, such as young and innovative entrepreneurs
- The prize purse is often one of the least important reasons teams compete
- Prestige and credibility can be more valuable to an early-stage team that is looking for additional customers, financing, or partnerships

PRIZES CREATE BENEFITS BEYOND THE INTENDED INNOVATION

Identify and mobilize new talent

- Prizes attract diverse talent worldwide, generate unexpected approaches, and reveal innovative system solutions

Stimulate new approaches

- Prizes encourage teams to seek and develop breakthrough technologies

Attract new capital to fund teams

- Prizes create a clear goal and timeline that enables teams to attract outside funders

Change public perception

- Prizes change what the public believes is possible

Strengthen markets and communities

- Prizes convene powerful networks of diverse experts - and encourage the sharing of ideas, approaches, and best practices within this network

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THE GRAND CHALLENGE

- CO_2 is making seawater more acidic
- In the last 200 years, the ocean has become nearly 30% more acidic
- Ocean acidification is destroying marine life—and the health of our oceans—at an unprecedented rate
- There is an appalling lack of ocean data, particularly about ocean acidification
- We don't possess the tools to sufficiently measure ocean pH
- We can't manage what we don't measure

WENDY SCHMIDT OCEAN HEALTH XPRIZE

The $2 million Wendy Schmidt Ocean Health XPRIZE is a global competition to incentivize the development of accurate, robust, and affordable pH sensors that will profoundly improve our understanding of ocean acidification

GOALS OF THE WSOHXP

The winning teams will produce the most accurate and affordable pH sensors under a variety of trials that mimic the challenging conditions of diverse ocean environments

INTENDED BREAKTHROUGHS

Inspire innovations in ocean sensing technology.

Catalyze ocean acidification research.

Catalyze the ocean services industry.

Inspire the public to engage.

WSOHXP: TWO $1M PURSES

ACCURACY PURSE: For super-accurate sensors that will give scientists the ability to measure ocean acidification throughout the world's oceans

AFFORDABILITY PURSE: For affordable and easy-to-use sensors that will give anyone the tools necessary to track and respond to ocean acidification

September 2013

March 2014

September 2014

December 2014

February 2015

March 2015

May 2015

July 2015

Downselect to 50 teams

Downselect to 20 teams

Downselect to 5 teams

Accuracy Purse:

1st place $750K

2nd place $250K

LAUNCH

PHASE I:
OCEAN
ACIDIFICATION
SOLUTIONS FAIR

PHASE II:
LAB TRIALS
•Phase 2a: Accuracy
•Phase 2b: Precision & Stability
•Controlled lab environment
•1 week, then 3 months
•Golden Ticket for winner of Phase 2a

PHASE III:
COASTAL
TRIALS
•Stability
•Ease-of-Use
•1 month

PHASE IV:
OCEAN
TRIALS
•Accuracy, Precision
•Research vessel in Pacific

AWARD

PHASE III:
COASTAL TRIALS
•Cost, Ease-of-Use
•Precision, Stability
•1 month
•Golden Ticket for winner of Coastal Purse Phase 3

Affordability Purse:

1st place $750K

2nd place $250K

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AWARDING THE PURSES

- **Accuracy Purse:** Focus on Accuracy and Precision
  - **Accuracy** – 40%
  - **Precision** – 30%
  - **Stability** – 20%
  - **Ease-of-Use** – 10%
  - Thresholds for cost and physical design characteristics
- **Affordability Purse:** Focus on Cost and Ease of Use
  - **Cost** – 25%
  - **Ease-of-Use** – 25%
  - **Accuracy** – 20%
  - **Precision** – 17.5%
  - **Stability** – 12.5%
  - Thresholds for accuracy, precision, and stability

OVERSIGHT & JUDGING

Scientific Advisory Board:

- Assist with the establishment of qualifications for prospective judges
- Appoint the Judging Panel
- Assist with development of judging criteria
- Provide input on the final Competition Guidelines

Judging Panel:

- Comprised of 5-7 highly qualified and impartial judges
- Serve as the official judges of the competition
- Responsible for evaluating compliance with guidelines and rules
- Possess the sole and absolute discretion to determine the winning teams

KEY OPERATIONAL PARTNERS

National Oceanic and Atmospheric Administration (NOAA)

- Scientists and scientific experts
- Policy and regulatory guidance
- Educational and outreach activities
- Critical partnership with national and international ocean health stakeholders

Pacific Marine Environmental Laboratory (PMEL)

- Oversight of the Validation Team, under the direction of Dr. Richard Feeley
- Oversight of facilities management for Phases 2, 3, and 4 to ensure appropriate engineering, data management, and data validation

Scripps Institution of Oceanography

- Prof. Andrew Dickson will develop the testing protocols for Phases 2, 3, and 4
- Independently oversee quality assurance and quality control of testing

PRIZE COUNCIL

Richard Feely

Christopher Sabine

Andrew Dickson

SUPPORTING THE INNOVATORS

Marketplace

- Assist teams in sharing information or strategies
- Identify third-party vendors and suppliers of value to the teams
- Connect to potential sources of capital and investment for the teams
- Connect to consulting and business support for teams

Team Summits

- Opportunities to engage other teams, industry partners, judges, and experts

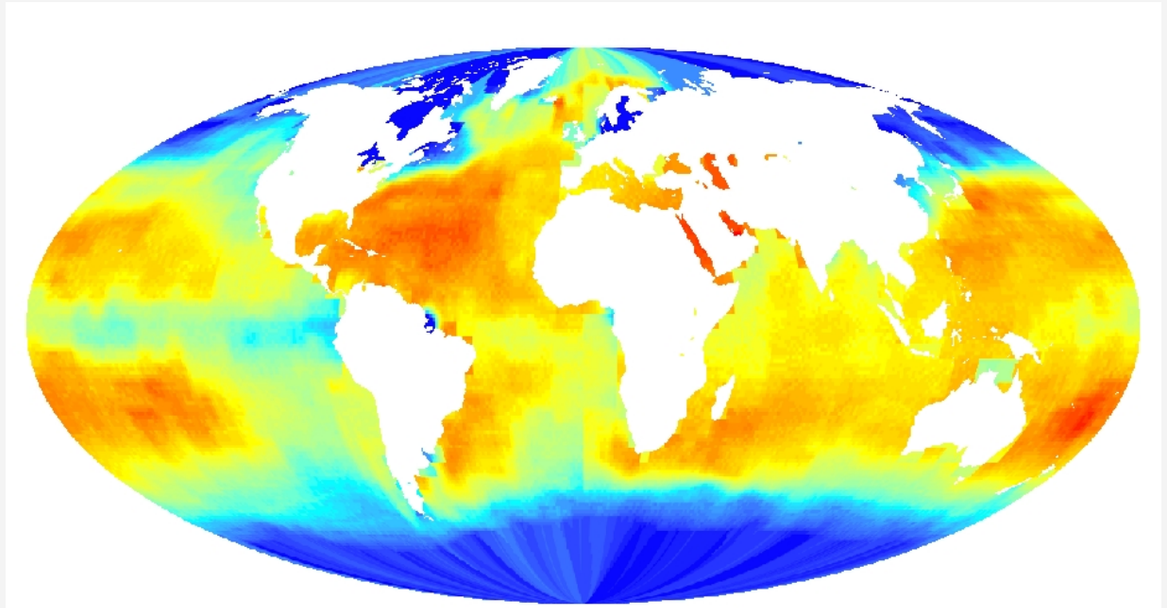
Direct Support

- Give teams opportunities to meet and collaborate.
- Help teams missing vital technologies connect to the appropriate people.
- Expose teams to potential adopters and funders.
- Identify teams that represent new market entrants and incumbent players.

POST-PRIZE INDUSTRY

Post-Prize Goals

- Create new markets for pH sensors
- Create new markets for ocean data



Post-Prize Markets

- Direct Markets
- New Markets

Post-Prize Activities

- Recognition Awards/Medals
- Ocean Services conference and industry association
- Policy, advocacy, and direct communications

POTENTIAL BONUS AWARDS

Regulatory Market

A reward of additional laboratory and ocean testing, plus vetting by regulators and managers, to the teams that can best serve the growing regulatory market

Scientific Market/Advancing Aragonite Chemistry

A reward of additional laboratory and ocean testing, plus vetting by scientists, to the teams that demonstrate their sensor's ability to integrate and interact with additional ocean sensors to calculate

Aquaculture Market

A reward of an advanced market commitment to test and use sensors in shellfish hatcheries to the teams that develop highly accurate sensors that can be used in flow through systems

CREATING IMPACT

Solve technical barriers

by inspiring innovators

by inspiring new markets in ocean services

by focusing resources and communities

Raise global awareness

of oceans

of innovative solutions to improve ocean health

Build a community of innovators and donors

to incentivize teams

to inspire advocacy

to catalyze an industry

to leverage for ocean solutions

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THANK YOU!

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