MORE with LESS
in a DIFFERENT way
• Who is Discovery Air?
• What do we do / for who and where?
• How North American and others deal with “Red-Air” currently and in the future
• Benefits / Possibilities
• Discovery Air Inc. subsidiary
• Owns and operate over 160 aircraft
• Provide CAS to Canada since 2005 and operate under trade Name Top Aces in US
• Active duty pilots fly onbord Discovery aircraft
  – Reputation, safety records combined with rigorous certification procedures both Military and civil
• Discovery doesn’t build aircraft. Provides aerial services to maximize training while preserving resources:
  – Hard cost saving
  – Soft cost saving
Optimize Air Force, Army and Navy readiness and training against relevant 21\textsuperscript{st} century “Red-Air” threats
• **Focus on Safety with over 65,000 Accident Free Hours**
  – Fully integrated into DND Military Flight Safety System
  – Fully-compliant (“dual-certified”) by both civil and military airworthiness systems
  – DA Defence places the highest emphasis on safety when carrying out operations
  – The General Safety Plan is integrated with our Quality Management System and is certified ISO 9001:2008
    • Culture of “Continuous Improvement”
  – The DA Defence Flight Safety team is managed by a Company Flight Safety Officer (CFSO) and supported by qualified Flight Safety representatives at each main and deployed operating base

"Our exemplary flight safety record is a direct result of the experience and depth of our team, the infrastructure and processes we have developed over the years and our commitment to formally improve and refine our quality management system and flight safety processes."
### Current Defense Services Footprint

**Operating Locations**

- **Toronto, Ottawa, Montreal**
  - Corporate HQ
  - Financing
  - Project Management
  - Maintenance/Engineering
  - Logistic support

- **Wittmund, GE**
  - 7 x A-4N, 1 x TA-4J

- **Mesa, AZ**
  - A-4 Ops center
  - 2 x Ajet
  - 2 x TA-4 J

- **Canadian iCATS MOBs**
  - Victoria, Cold Lake, Bagotville, Halifax
  - 4 x Ajet / MOB
  - 2 x IAI 1124

- **CONUS DOBs**

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**Discovery Air Proprietary and Confidential**
• **Aggressor training supply-demand drivers:**
  - Increased Red Air support required for Advanced 4\textsuperscript{th} Gen (F-2000, Rafale) and new 5\textsuperscript{th} Gen fighters (F-22 /F-35)
  - High operational Cost Per Flight Hour (CPFH) of 4\textsuperscript{th} Gen Fleets
  - Reduced ability to generate internal Aggressor hours with retirement of 4\textsuperscript{th} Gen Fleets
  - Hourly operating cost gap of 5\textsuperscript{th} Gen fighters make similar training cost-prohibitive
  - Increasing JTAC training requirements with decreased ground attack aircraft available

**COMMON NEED**

- Increased Requirements + Fewer Available Assets + Budgetary Constraints + **Reduced Manning**

= **Growth of Contracted Adversary Services**
• **Germany**  
  – Contract since January 2015

• **Jet air support training trial Australian Defence Forces:**  
  – Two years contract (awarded)  
    • Partnership with air affair Australia

• **ASDOT program UK** (competition scheduled in 2018)  
  – Starting 2020  
  – 15 years program to provide contracted service to UK MoD (up to 11,500 Fh/Year)  
  – Discovery and Inzpire team up

• **USAF**  
  – Next solicitation for Huge Adversary contract  
  – 12 Air Force Bases for more than 30,000 Fh contract/year

**CURRENT CHANCES**
• The program is designed to support pilot training for the most advanced Armed Forces.

• DA will offer a service of absolute excellence, featuring:
  – high efficiency (ensuring high standards of operational capability for military personnel) and
  – low costs (government saving budget)
  – Resources optimization (service aircraft extension life)
**Adversary Air Service (Air Force and Navy):**
- Basic fighter maneuvers (BFM)
- Air combat maneuvers (ACM)
- Air Intercept
- Air combat training (ACT)
- Large force employment (LFE)
- Air to Air refueling

**Target e OT&E (All Services):**
- Aerial Threats simulation for Naval Forces & G-BAD
- Aerial target simulation for Naval Forces & N-BAD
- J-TAC Training
- OT&E for Military & Civil Organizations
- AAR Operators Training
Without CATS, an additional 5000 CF18 hours annually would have been required.
- Cost Savings > $165M annually
- No cost to DND for start-up
- Over 65,000 accident free flying hours
- Savings to date in excess of $1.7B over using CF-18 over last 10 years
Out of 10,000 Annual Flying Hours

25% of which is Red Air
• **Hard cost saving (2500 Fh/Y)**

<table>
<thead>
<tr>
<th></th>
<th>per Year</th>
<th>total*</th>
</tr>
</thead>
<tbody>
<tr>
<td>Air Force</td>
<td>€ 150.000.000</td>
<td>€ 1.500.000.000</td>
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<tr>
<td>Adversary air service</td>
<td>€ 32.500.000</td>
<td>€ 325.000.000</td>
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<tr>
<td>Total saving using Adversary Air Service</td>
<td>€ 117.500.000</td>
<td>€ 1.175.000.000</td>
</tr>
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* *10 years time frame

• **Soft cost saving**
  1. Airframe life
  2. Quality Training time for line pilots
     1. No reverse training risk
     2. No risk of poor realistic threat replica

\* €0, €200.000.000, €400.000.000, €600.000.000, €800.000.000, €1.000.000.000, €1.200.000.000, €1.400.000.000, €1.600.000.000 per Year total*
• Consider contracted solutions as a viable, complementary, adversary support solution
• Advocate for having these types of capabilities available from a Canadian Company or a dedicated team of companies
• Advocate to Set the bar high on airworthiness and safety standards
Q&A