# Pilot Introductory Program

**AviaSim Canada**

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# Program Overview: What to Expect

01

## Flight Fundamentals

Learn essential principles of flight and key instruments

02

## Pilot Communication

Master standardized aviation terminology and ATC interactions

03

## Flight Planning

Prepare a complete flight plan from departure to destination

04

## Simulator Mission

Take command for a full flight scenario with instructor guidance

Each session is 100% personalized to your interests, experience level, and learning pace—combining theory with hands-on practice throughout all four hours.

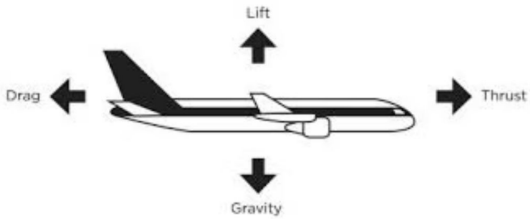
# Understanding the Fundamentals

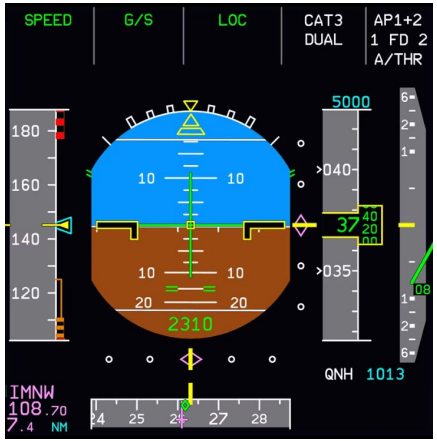
## Key Flight Instruments

- Altitude indicators
- Airspeed indicators
- Attitude director
- Heading indicators


## Aerodynamic Forces

- Lift, drag, thrust, and weight
- How they interact during flight

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# Understanding the Fundamentals

## Flaps and Slats

- To increase lift at slower airspeeds
- To increase drag
- Delay airflow separation

## Spoilers

- To increase the descent rate without gaining speed
- To assist with roll control
- To "dump" lift
- To increase aerodynamic braking

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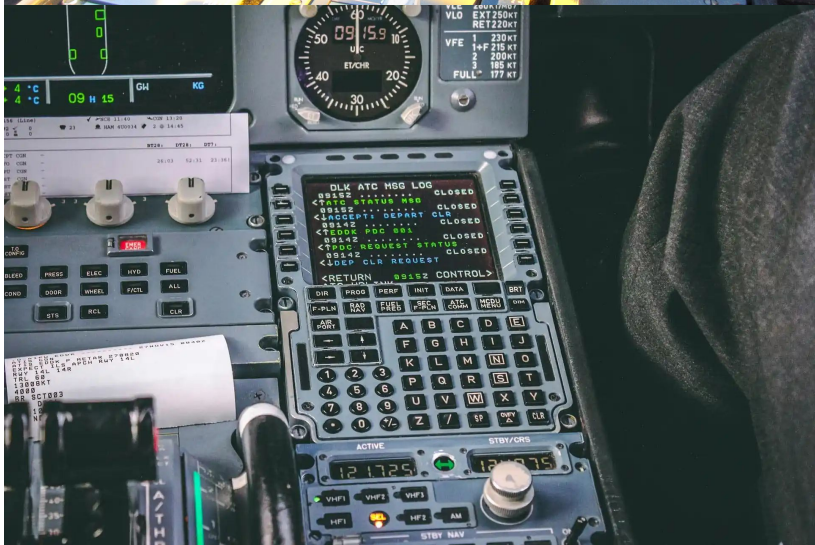
# Modern Aviation Technology

## Autopilot & Auto-thrust

- Reduces Pilot Workload
- Enhances Fuel Efficiency
- Improves Safety and Precision
- Increases Passenger Comfort

## Flight Management System

- Improved Fuel Efficiency
- Reduced Pilot Workload
- Enhanced Navigation Precision

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# Modern Aviation Technology

## Fly-by-Wire Systems

- Increased Safety
- Reduced Weight and Improved Efficiency
- Enhanced Performance

## Flight Envelope Protection

- Enhanced Safety
- Predictable Performance

## Situational Awareness Tools

- Improved Decision-Making
- Proactive Threat Management


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# Standardized Phraseology

**What it Is:** A set of precise, agreed-upon words and phrases used by pilots and air traffic controllers (ATC)

**Why it's Essential:** Safety and Efficiency

**Key Principles:** Brevity, Clarity and Standard Words

**When You Use It:** During every phase of flight

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# Sterile Cockpit

## What is "Sterile Cockpit"?
It's a period where non-essential communication and activities are prohibited.

## When is it Active?
During all operations below 10,000 feet (or 18,000 feet)

## Why it's Crucial:
- Focus on flying
- Error prevention
- Teamwork

## What's NOT Allowed:
- Personal conversations
- Reading non-essential materials
- Eating or drinking
- Performing non-essential paperwork
- Any activity that diverts attention from flying the aircraft.

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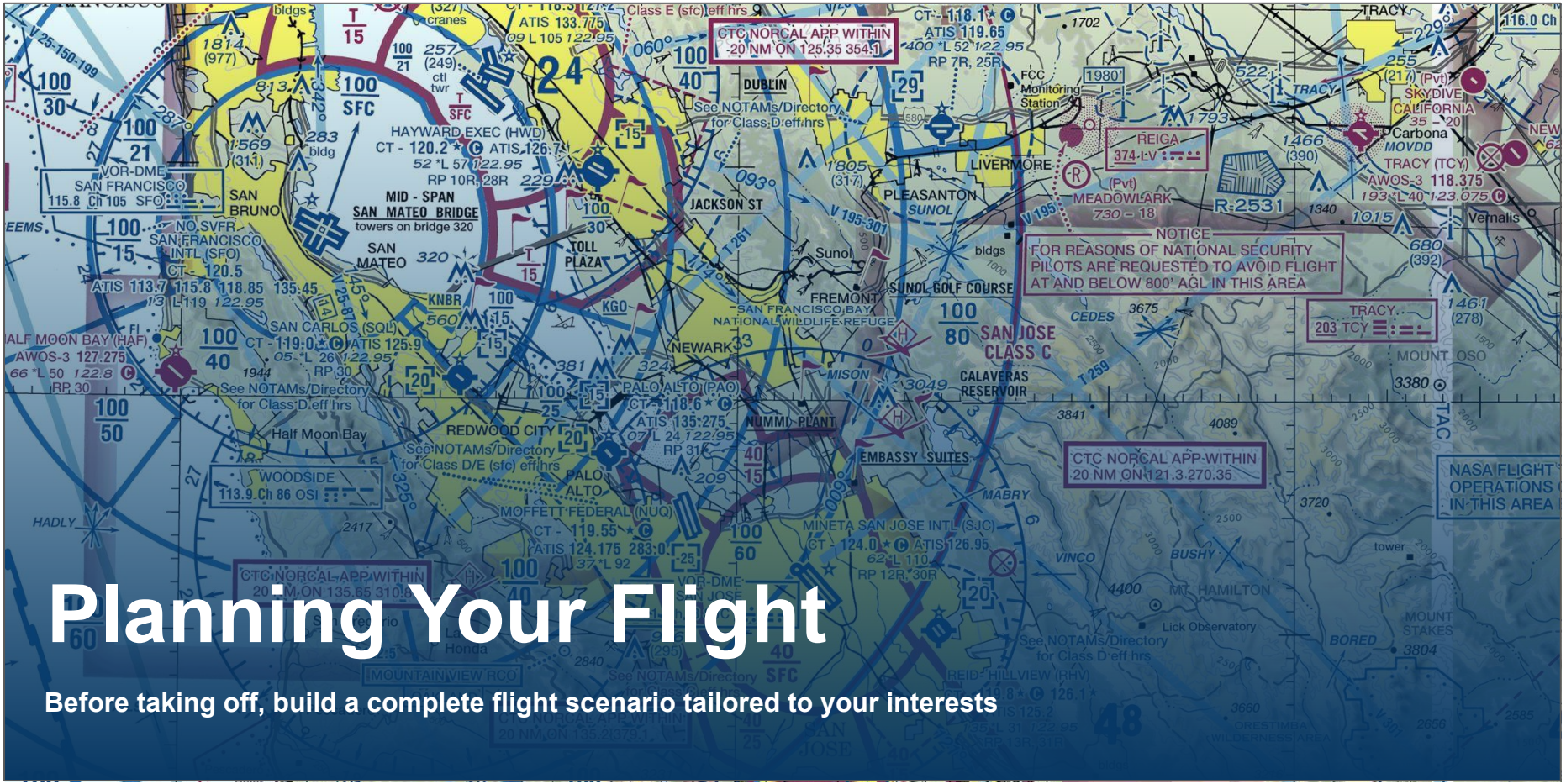
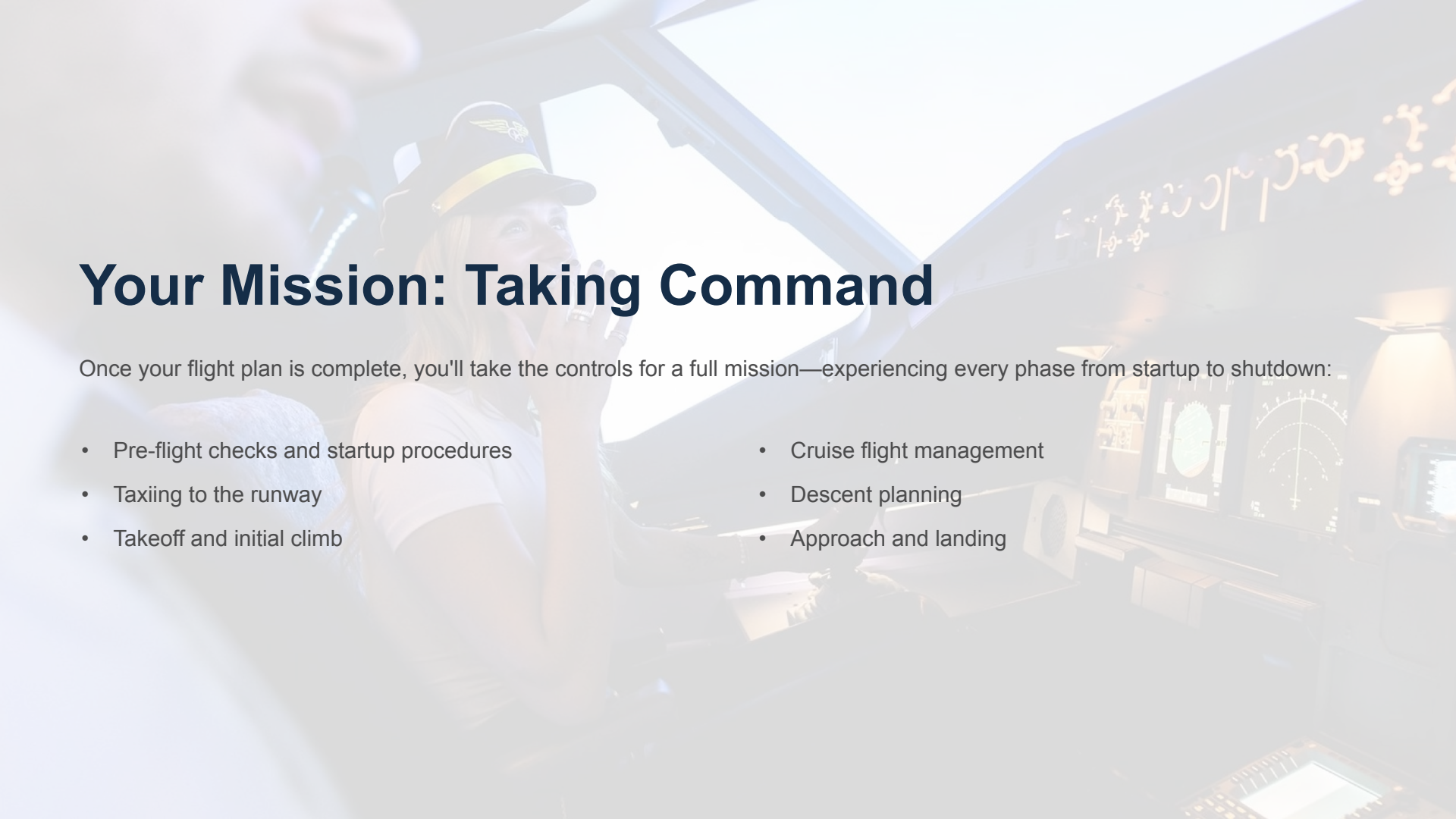



# Planning Your Flight

**Before taking off, build a complete flight scenario tailored to your interests**



# Your Mission: Taking Command

Once your flight plan is complete, you'll take the controls for a full mission—experiencing every phase from startup to shutdown:

- Pre-flight checks and startup procedures
- Taxiing to the runway
- Takeoff and initial climb
- Cruise flight management
- Descent planning
- Approach and landing