PhD Interview Cheatsheet

Program / School: _____

Name: _____ **Date:** _____

1 Elevator Pitch (Tell Me About Yourself)

Goal: Connect prior training to the target field; show trajectory + motivation + fit.

- **Background:** Final-year undergraduate at _____; exchange/research at _____.
- **Academic core:** Major/minor in _____; strong quantitative foundation in _____
- **Pivot / motivation:** From _____ → toward _____ due to _____.
- **Current focus:** Applying _____ (e.g., control/RL) and _____ (e.g., networks) to _____.
- **Why PhD:** To develop _____ models/methods that produce _____ insights + translate to _____.

Sample Script (Read/Paraphrase):

"My name is _____, and I'm a final-year undergraduate at _____.

I study _____. Early on, I worked on _____ (e.g., optimization / ML / theory). Over time, I became increasingly drawn to _____ because _____.

Recently, I've been applying _____ to _____. I'm pursuing a PhD to bridge disciplines—using rigorous modeling to understand _____, generate predictive insights, and uncover underlying mechanisms."

2 Key Research Projects (Deep Dives)

2.1 Project A (Template)

Title: _____

One-line summary: _____

Problem / Why it matters:

- _____

Method / What you did:

- _____
- _____

Results / Evidence:

- _____

Your contribution (be explicit):

- _____

Possible Q & A:

- **Q: What is the main takeaway?**
  A: _____

- **Q: What was the hardest part technically?**
  A: _____
- **Q: What would you do next if you had 6 more months?**
  A: _____

2.2 Project B (Template)

Title: _____

Summary:

- _____
- _____

Key contributions (3 max):

- _____: _____
- _____: _____
- _____: _____

Possible Q & A:

- **Q: Why did you choose this modeling approach?**
  A: _____
- **Q: How did you validate the model?**
  A: _____

2.3 Project C (Template)

Title: _____

Summary: _____

Key contributions:

- _____
- _____

Possible Q & A:

- **Q: What does this show about the underlying mechanism?**
  A: _____

3 Addressing a Non-Linear Background (e.g., Econ/Finance → Biology)

Use this when asked "Why this field now?" Keep it human + technical.

Personal motivation (optional, 2–3 sentences):

_____

_____

Technical continuity (make the bridge explicit):

- Common structure: _____
- Transferable tools: _____
- What changed: from optimizing _____ to optimizing/understanding _____

Philosophy (1–2 lines):

_____

4 Soft Skills & Teaching / Collaboration

- **Communication:** _____
- **Collaboration:** _____
- **Mentoring/Teaching:** _____
- **Value proposition:** I can _____

5 Why This Program? & Questions for Them

5.1 Why this program / group? (3 bullets max)

- **Research fit:** _____
- **Training fit:** _____
- **Community/resources:** _____

5.2 Questions to Ask (pick 2)

1. *"What does a successful first year look like in your group (skills, milestones, reading, projects)?"*
2. *"How do you decide problem selection and scope—especially balancing publishability vs. risk?"*
3. *"How does collaboration typically work in your lab/group (expectations, co-mentorship, authorship norms)?"*
4. *"What training opportunities exist for my current gaps (e.g., wet-lab exposure, clinical context, data access)?"*