

PHYS/GLBL 280

WRITING LAB- 03/09/2026

If you have received a HOLD, you must meet with a TA. You must have a finalized and approved topic before Spring Break.

RE3v2:

- For RE3v2 you will revise your RE3v1 essay. This revision should address all of the comments from your TA and peer review partner.
- AI DISCLOSURE STATEMENT:
 - **AI usage is not required** for this assignment, as mentioned earlier during the discussion for **RE 3v1**.
 - **If you choose to use AI**, the process must follow the **same guidelines as previous assignments**.
 - **An AI Disclosure Statement is required**, regardless of whether you used AI or not.
 - In this disclosure, you should **clearly state whether AI tools were used** in completing the assignment. If AI was used, **briefly explain how it was used** in your writing process.

RE3v2:

- WRITER'S MEMO:
 - In addition to your **RE3v2 essay**, you must submit a **Writer's Memo (5–10 sentences)**.
 - The Writer's Memo should **describe how you incorporated feedback from your TA and your peer review partner**.
 - If there was feedback that you **chose not to incorporate**, briefly **explain your reasoning for not using it**.
 - Submit **both the RE3v2 essay and the Writer's Memo together** with your assignment.

Features:	Description:	Range :	Comments on student paper for each feature (noting problems and strengths):
Coverage of issues and information -2% per issue not covered	Includes the following: 1. A brief summary. 2. An introductory paragraph that describes some of the most important nuclear-explosive nuclides. 3. A paragraph that (a) lists the isotope requirements for making a uranium weapon, (b) lists the technologies currently available to produce uranium that meets these requirements, and (c) notes and describes the particular technology that is currently favored. 4. A paragraph that describes the simplest way to create a nuclear explosion using weapons-grade uranium. 5. A paragraph that lists the usually quoted isotope requirements for making a plutonium weapon and describes the technologies used to produce plutonium that meets these requirements. 6. A paragraph that describes how to create a nuclear explosion using weapons-grade plutonium. 7. A paragraph that explains why the production method that is optimal for producing weapons-grade plutonium is incompatible with efficient power generation. 8. A paragraph that describes why it is more difficult to make a bomb using reactor-grade plutonium than using weapons-grade plutonium. Indicate whether it is possible to create a nuclear explosion using reactor-grade plutonium. 9. A final paragraph that explains briefly why restricting the availability of nuclear explosive nuclides is the most effective way to prevent the spread of nuclear weapons.	20% High Mid Low	
Precise and accurate use of concepts	Course concepts from lecture and readings are employed clearly, accurately, and with a sufficient level of detail (i.e. quantified) in service of the above objectives.	15% High Mid Low	
Explanation & argument	Rationale for arguments (particularly regarding sections 3c, 4, 7, 8, and 9) is clear and convincing. (-2% for each of the four sections not satisfied)	15% High Mid Low	

Professional style	<p>Geared toward college-educated members of congress. Congruent with Congressional Research Service report style. Language (word choice, sentence structure, flow of information etc.) is precise and straightforward, attending to: Concision Clarity Brevity Professional tone Organization</p> <p>Comprehensive and thoughtful use of sources (need all three). - Source info clearly cited. - Uses a mixture of quotation, paraphrase, and summary.</p>	<p>10%</p> <p>High</p> <p>Mid</p> <p>Low</p>	
Conformity to conventions	<p>1.5-2 pages (single-spaced) Title and section headings specified in prompt Header and date in correct format Page numbers 12-point Times New Roman font throughout (including page numbers) 1.25" side margins and 1" top margins and .5" bottom margins. Citation practices specified in prompt. Key terms bolded in first use (check = all correct, x = some mistakes (-10)) **If you can't find the error, come to office hours!</p>	<p>10%</p> <p>High</p> <p>Mid</p> <p>Low</p>	
Copy editing and use of standard language	<p>Grammar and mechanics are edited for correctness and legibility.</p>	<p>5%</p> <p>High</p> <p>Low</p>	
Quality and thoughtfulness of revision and rationale		<p>25%</p> <p>High</p> <p>Mid</p> <p>Low</p>	
Overall Comments:			

RPv1:

Main Task:

- Write the Initial Draft of Your Research Paper, Incorporating Your Colleague's Response (Includes a Writer's Memo)
- Should be a drafts of a 5–6 page research paper.
- **Do not forget the abstract on the cover page.**
- Must integrate **technical and policy perspectives**
- Should emulate the style of the **Illini Journal of International Security (IJOIS)**.

Paper goals:

- Analyze a **global security problem**.
- Use **both political science and engineering perspectives** and conclude with **brief policy or technical solutions**.
- Include a **clear thesis statement in the introduction**
- Integrate **technology and policy perspectives**, follow a **problem–solution structure** and provide **thoughtful analysis of the research question**
- Include **at least 6 independently researched sources**

Body length:

- **5–6 pages of body text:**
- Not included in length:
 - Cover page
 - References page
 - Figures/tables
- **Required order:**
 - Cover page
 - Body (5–6 pages)
 - References page
 - Figures/tables (optional)

Total submission: 7–10 pages depending on figures.

- **Cover Page and Abstract:**

- Cover Page must include:
 - Required **header information**
 - **Short descriptive title** (≤ 100 characters)
 - **Half-page abstract**

Abstract Should include:

- Describe the **research question**
- Summarize **conclusions and recommendations.**
- Encourage readers to read the full paper

Important:

- Cover page is not numbered.
- Page 1 begins with the introduction.

Research, Citations, and Figures :

- **Minimum 6 sources required**
- **At least one:** book, book chapter, or peer-reviewed paper
- **Limits:**
 - **Max 2 assigned readings**
 - **Max 2 newspaper articles**
 - **No lecture slides**
 - **Only approved online documents**
- **Use APA citation style**
- **In-text format: (Author, Year)**
- **Every citation must correspond to a source in the References page**

- **Up to 2 figures/tables**
- **Must be referenced in the text**
- **Placed after the References page**
- **Must include number and caption**
- **Should be essential for understanding the paper**

RPv1 Development Process:

1. Research (*No AI*)

- Review the sources identified in your **research proposal**.
- Evaluate their arguments, evidence, and relevance to your topic.
- **Find additional scholarly sources if needed** to strengthen your research base.
- Focus on gathering information that will help you **build and support your main argument**.



- Write the **first complete version of your paper**.
- Include all required components:
- **Cover page**
 - **Introduction and thesis; Body paragraphs with evidence and analysis; Conclusion; References page**
- Your draft should present a **clear argument supported by your research sources**.



3. AI Analysis (*AI Allowed*)

Upload your completed draft to an **AI tool**.

- Ask the AI to:

- **Critique the strength of your argument**
- **Identify weaknesses or gaps in reasoning**
- **Generate a possible counterargument**
- Use this step as a way to **test and challenge your argument**, not to rewrite the paper.



4. Editing (*No AI*)

- Carefully **review the AI feedback** and evaluate whether it is useful.
- Decide **which suggestions improve your argument** and which do not.
- Revise your draft accordingly to **clarify claims, strengthen evidence, and improve structure**.

Counter Arguments, Writer's Memo, and Writing Rules (RPv1):

Addressing Counter Arguments:

- After receiving **AI critique**, consider the **counterargument generated about your policy recommendation**.
- Briefly **acknowledge this opposing perspective in your conclusion**.
- Explain **why your policy recommendation is still stronger or more convincing** despite this critique.
- This response should be **short and concise**, typically **only a few additional sentences** in the conclusion.

Your submission must include a **Writer's Memo** that explains your writing and revision process.

- Include:
 - **AI disclosure statement** indicating whether AI was used
 - **A link or copy of your AI prompts and conversation**
 - **Analysis of the AI's feedback** on your argument
 - Explanation of **whether you incorporated the AI's suggestions and why**
- Also reflect on:
 - **Strengths of your draft**
 - **Areas that still need improvement**
 - How your paper **integrates both technical and political science perspectives**

- Your research paper must:
 - Be **original work written specifically for this assignment**
 - Be written **entirely in your own words**
 - Demonstrate **your analysis and understanding of the sources.**
- You may **not**:
 - Ask AI to **write or generate any part of the paper**
 - **Reuse writing from previous courses or assignments**

Spring Break Recommendation

- It is **recommended (but not required)** that you **review or work on your research paper over Spring Break.**
- While it is unfortunate that the timeline overlaps with the break, **making progress during this time can help you stay on track for the upcoming deadlines.**

Phys 280 Rpv1 rubric:

No hard copy submitted: -5

No RPPv2 attached: -5

RPv1 submitted late electronically: -15

Features:	Description:	Range:	Comments on student paper for each feature (noting problems and strengths):
Coverage of issues and information	<p>includes a thesis statement in the introduction that answers a focused research question developed from the topic chosen in the research paper proposal</p> <p>follows a problem-solution structure, with a possible solution or solutions to the problem discussed briefly but persuasively in the conclusion</p>	<p>15%</p> <p>High</p> <p>Mid</p> <p>Low</p>	
Technology - policy balance	<p>sufficient balance and effective synthesis, developed in collaboration with the secondary author</p>	<p>15%</p> <p>High</p> <p>Mid</p> <p>Low</p>	
Precise and accurate use of concepts	<p>concepts key to audience understanding of the issue you've chosen are presented with accuracy and appropriate detail for your purpose</p>	<p>10%</p> <p>High</p> <p>Mid</p> <p>Low</p>	
Research, Integration of knowledge, and Analysis	<p>provides a thoughtful, informed, and accurate analysis of your answer to the research question</p> <p>demonstrates that independent research was conducted, integrates research effectively, and acknowledges and attributes the work of others</p> <p>selective and thoughtful use of sources aimed at creating new knowledge by synthesizing and extending the work of others through a mix of summary, paraphrase, and quotation</p> <p>paper mainly provides an analysis of a problem but ends with a brief explanation and justification of recommended solutions</p>	<p>25%</p> <p>High</p> <p>Mid</p> <p>Low</p>	

Professional style	congruent with the IJOIS journal article style shows clear and effective organization, especially through the use of topic sentences at the beginnings of paragraphs, sections, and subsections, with each chunk of text developing its announced topic logically and separately	15% High Mid Low	
Conformity to conventions	5-6 pages doubled-spaced includes cover page with an appropriate title and abstract includes separate reference page includes section headings header block and date in correct format (comment, no deduction) page numbers (except cover page) 12-point Times New Roman font throughout (including page numbers) 1.25" side margins and 1" top margins and .5" bottom margins. At least six acceptable sources (includes at least one relevant book, chapter of book, or peer-reviewed paper) no more than two assigned readings accurate use of APA style for in-text references and reference list One error -5, two -10, three or more -15	15% High Mid Low	
Copy editing and use of standard language	First draft does not need to be perfect as you are expected to make higher order revisions before focusing in on a professional product, but out of courtesy for your readers, it should be readable without inaccurate, confusing, or poorly organized text.	5% High Low	
Overall Comments:			

Midterm Exam Information:

- **Date & Time:** Tuesday, March 24- **6:00 PM until conclusion**
- **Location: Zoom**
- **A Zoom invitation and link will be sent via class mass email.**

****Midterm Exam**

- **Date & Time:** Thursday, March 26- **2:00 PM – 3:20 PM**
- **Location: 128 Ceramics (PHYS 280 Lecture Room)**

- The **course website** contains:
 - **Past midterm exams**
 - **Solution keys**
- It is **highly recommended** that you review these materials while preparing for the exam.

Discussion Section Activity:

<https://jeopardylabs.com/play/phys280-3>