

USING AI TO CREATE ASSIGNMENTS FOR YOUR COURSES



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BENEFITS OF AI TOOLS IN THE CLASSROOM

The rise of generative AI has brought a groundbreaking change to higher education. With endless possibilities associated with AI tools and their ability to impact students' learning experiences, the benefits of AI correspondingly increase, allowing for more effective teaching. Some advantages associated with using AI in the classroom include:

- **Rapid Development of Educational Materials:** Al can swiftly generate assignments, learning objectives, and rubrics, tailoring them to specific course goals and student needs.
- **Customized Learning Experiences:** Al's ability to analyze individual student performance enables the creation of personalized learning plans, enhancing student engagement and success.
- Administrative Efficiency: Routine tasks like attendance tracking and scheduling are automated, allowing educators to focus more on teaching and less on administrative duties.
- **Dynamic Assignment Formats:** AI can innovate traditional assignment structures, making them more engaging and relevant to current educational trends.

Which of these AI tools have you used in your teaching?

10 AI Tools that Instructors Must Use in their Classrooms

PRACTICAL APPLICATIONS OF AI TOOLS FOR INSTRUCTORS

In this resource, we will be walking through how to use ChatGPT to help you quickly generate resources for your class, including:

- Creating assignments
- Creating Learning Objectives
- Creating Rubrics

Bonus: <u>Watch this 3 minute tutorial on using Kritik's free AI tool to create assignment and</u> <u>rubrics!</u>





EXAMPLE 1: HUMANITIES COURSE

In this example, we will be using ChatGPT 4 to generate assignment details, learning objectives, and rubrics for a first-year communications course.

To begin, we will attach the course syllabus to our initial prompt.



Here, we have given ChatGPT a file of our syllabus, the AI will then train itself on the information, allowing us to ask for additional context, and generate responses based on this document. Next we want to ask it for a breakdown of the assignments in this syllabus, to confirm that the AI understands the content, and so we can generate actual activities from them.





ChatGPT

The syllabus for COMM 663: Judgment and Decision Making includes the following assignments:

- 1. **Class Discussion (30% of grade)**: Involves discussing assigned papers during class. Each class, two students are chosen as discussion leaders who prepare and lead the discussion.
- 2. **Two Paper Critiques (30% of grade, 15% each)**: Students must submit two critiques on selected papers. These critiques should analyze the papers and propose a follow-up study.
- 3. **Research Proposal (paper and presentation, 40% of grade)**: By the end of the course, students are expected to submit a research proposal on a topic related to consumer behavior, including a literature review, theoretical framework, research hypotheses, and proposed research method.

Each component supports the learning objectives by encouraging critical thinking, understanding of consumer research, and application of research methods.

After asking ChatGPT for the breakdown, we can see here that it has taken all the assignments, as well as the information and grading weights into account. Now we can start generating the activities, learning objectives, and rubrics for these specific assignments.

Let's start by making assignment **#3, Research Proposal (40%).**

c) You

I want you to generate an activity outline for me, based on assignment #3. Ensure that it follows the learning objectives stated in the course syllabus, and that it is related to the details of the assignment. Give me a simple short outline.





As you can see, ChatGPT has given us a simple outline of how the activity can look like. This is great as a starting point, but we want to go further and ask ChatGPT to actually create an assignment that we can use as a template.

Now, we will go further and ask ChatGPT to make an entire assignment from this quick outline made:

🔘 You

I want you to generate the entire activity for my students. Ensure that it follow the learning objectives stated in the course syllabus, and that it is related to the details of the assignment.



ChatGPT

Research Proposal Activity for COMM 663: Judgment and Decision Making

Objective: Develop a comprehensive research proposal that contributes to the field of consumer behavior, utilizing critical thinking, theoretical frameworks, and methodological rigor.

Duration: 8 Weeks

Week 1-2: Introduction and Literature Review

- Task: Choose a consumer behavior topic. Conduct a literature review to identify research gaps.
- Outcome: A written introduction to the topic and a summary of the literature review highlighting the gap your research will address.

Week 3-4: Theoretical Framework and Hypotheses

- Task: Based on the literature review, develop a theoretical framework that supports your research question. Formulate specific, testable hypotheses.
- · Outcome: A document outlining the theoretical framework and proposed hypotheses.

Week 5-6: Research Design and Methodology

- Task: Design your study. Select a research method (e.g., experiment, survey) and describe your data collection methods, sampling strategy, and participant selection.
- Outcome: A detailed description of the research design and methodology.

Week 7: Data Analysis Plan

- Task: Outline how you plan to analyze the data collected from your study. Specify statistical or qualitative methods.
- Outcome: A comprehensive plan for data analysis, including expected statistical tests or qualitative analysis techniques.

Week 8: Finalizing the Proposal and Presentation

- Task: Compile your work into a final research proposal document. Prepare a presentation summarizing your research proposal.
- Outcome: A completed research proposal and a PowerPoint presentation ready for class presentation.

Deliverables:

- 1. Introduction and Literature Review Document
- 2. Theoretical Framework and Hypotheses Document
- 3. Research Design and Methodology Description
- 4. Data Analysis Plan
- 5. Final Research Proposal Document
- 6. PowerPoint Presentation

Evaluation Criteria:

- Relevance and originality of the research topic
- Depth and breadth of the literature review
- Coherence and applicability of the theoretical framework
- · Clarity and feasibility of the research design and methodology
- Rigor of the data analysis plan
- Quality of the written proposal and presentation

This activity aligns with the course objectives by engaging students in the process of developing a research proposal that is grounded in theory, methodologically sound, and contributes to the understanding of consumer behavior.



From our prompt, ChatGPT has created an entire activity for the assignment, including details, deliverables, objectives, and criteria. It is important to note that this is great as a starting point, but should be edited manually in-order to meet the requirements for your course.

Now, let's create learning objectives for this assignment, that relate to the course syllabus.



ChatGPT has now created learning objectives based on the details from the assignment previously generated, and the syllabus we uploaded in the beginning.

Finally, we need to generate a rubric for students to use.



You Please generate a rubric based on the assignment you created. Ensure it uses levels 0-3 and is in chart format

💮 ChatGPT

Research Proposal Assignment Rubric

Criteria	Level 0 (0-59%)	Level 1 (60-69%)	Level 2 (70-79%)	Level 3 (80-100%)
Literature Review	Minimal or no review; fails to identify gaps.	Identifies some relevant research but lacks depth in gap identification.	Good review of literature with clear identification of research gap.	Comprehensive and critical review of literature; clearly identifies and articulates research gap.
Theoretical Framework	Lacks a theoretical framework.	Presents a basic framework but with limited connection to research question.	Develops a clear theoretical framework connected to research question.	Articulates a robust theoretical framework that thoroughly supports research hypotheses.
Research Hypotheses	Hypotheses are unclear or not testable.	Hypotheses are testable but lack specificity or relevance.	Clear, specific, and relevant hypotheses.	Formulates clear, specific, testable, and highly relevant hypotheses.
Research Design & Methodology	Inadequate description of design and methodology.	Basic description of research design and methodology with some flaws.	Good description of research design and methodology; mostly appropriate and feasible.	Comprehensive and detailed description of a well-thought-out and feasible research design and methodology.
Data Analysis Plan	No plan or an inappropriate plan for data analysis.	Basic plan for data analysis but lacks detail or appropriateness.	Clear and appropriate plan for data analysis with some detail.	Detailed and highly appropriate data analysis plan; demonstrates understanding of statistical or qualitative methods.
Communication	Incoherent written proposal and/or presentation; fails to convey key elements.	Basic coherence in written proposal and presentation but lacks clarity or persuasiveness.	Clear and coherent written proposal and presentation; communicates most elements effectively.	Exceptionally clear, coherent, and persuasive written proposal and presentation; excellently communicates all elements.

We now have a rubric generated by ChatGPT. You can edit the prompt to your liking by adding further details such as editing the number of levels, categories, and more.





EXAMPLE 2: ORGANIC CHEMISTRY COURSE

In this example, we will be using ChatGPT 4 to generate assignment details, learning objectives, and rubrics for a first-year Organic Chemistry course.

To begin, we will attach the course syllabus to our initial prompt.



Here, we have given ChatGPT a file of our syllabus, the AI will then train itself on the information, allowing us to ask for additional context, and generate responses based on this document. Next we want to ask it for a breakdown of the assignments in this syllabus, to confirm that the AI understands the content, and so we can generate actual activities from them.





ChatGPT

The syllabus for Organic Chemistry I (CHEM-UA 9225) outlines the following assignments and their contribution to the final grade:

- 1. Laboratories: Lab reports and a final practical examination, accounting for 25% of the final grade.
- 2. **Quizzes**: Conducted during recitation sections, with 12 quizzes scheduled. The top 9 scores from these quizzes will count towards this portion of the grade, making up 20% of the final grade.
- 3. **Midterm Exams**: Two midterm examinations, each contributing 20% to the final grade, totaling 40%.
- 4. **Final Exam**: A comprehensive final examination covering the entire course content, contributing 40% to the final grade.

After asking ChatGPT for the breakdown, we can see here that it has taken all the assignments, as well as the information and grading weights into account. Now we can start generating the activities, learning objectives, and rubrics for these specific assignments.

Let's start by making assignment #1, Lab Reports (25%).

c) You

I want you to generate an activity outline for me, based on assignment #1. Ensure that it follows the learning objectives stated in the course syllabus, and that it is related to the details of the assignment. Give me a simple short outline.





As you can see, ChatGPT has given us a simple outline of how the activity can look like. This is great as a starting point, but we want to go further and ask ChatGPT to actually create an assignment that we can use as a template.

Now, we will go further and ask ChatGPT to make an entire assignment from this quick outline made:

C You

I want you to generate the entire week 1-2 and week 3-4 activities for my students. Ensure that it follows the learning objectives stated in the course syllabus, and that it is related to the details of the assignment.



ChatGPT

Week 1-2 Activity: Introduction to Laboratory Safety and Techniques

Objective: To ensure understanding and application of basic laboratory safety protocols and to introduce fundamental laboratory techniques.

Activities:

- Laboratory Safety Training: Interactive session covering essential safety practices, understanding of MSDS, correct use of PPE, and emergency procedures.
- Equipment Familiarization: Hands-on session to familiarize with common laboratory equipment (pipettes, balances, Bunsen burners). Introduction to proper setup and operation.
- **Basic Laboratory Techniques**: Demonstrations followed by practical exercises on measuring, mixing, and heating chemical substances accurately and safely.

Assessment:

- Safety Quiz: A quiz covering laboratory safety rules and procedures.
- **Practical Skills Test**: Evaluation of students' proficiency in using basic laboratory equipment and techniques.

Week 3-4 Activity: Synthesis of Simple Compounds

Objective: To learn and apply synthesis techniques for creating simple organic compounds, focusing on reaction setup, execution, and analysis of results.

Activities:

- Synthesis Preparation: Lecture on principles of organic synthesis, including reagent selection and reaction mechanisms.
- **Practical Synthesis**: Students perform a simple synthesis reaction, emphasizing proper reaction setup and execution.
- Analysis and Reporting: Introduction to basic methods for analyzing synthesized compounds (e.g., melting point, TLC). Students prepare a lab report analyzing yield, purity, and reflecting on the synthesis process.

Assessment:

- Lab Report: Evaluation based on the synthesis process, analysis of the product, and understanding of the underlying chemistry.
- **Peer Review**: Students review each other's lab reports to enhance learning and critical feedback skills.



From our prompt, ChatGPT has created an entire activity for the assignment, including details, deliverables, objectives, and criteria. It is important to note that this is great as a starting point, but should be edited manually in-order to meet the requirements for your course.

Now, let's create learning objectives for this assignment, that relate to the course syllabus.



ChatGPT has now created learning objectives based on the details from the assignment previously generated, and the syllabus we uploaded in the beginning.

Finally, we need to generate a rubric for students to use.



🖸 You

Please generate a rubric based on the assignments you made. Ensure it uses levels 0-3 and is in chart format

🌀 ChatGPT

Rubric for Laboratory Assignments (Week 1-2 and Week 3-4)

Criteria	Level 0 (0-59%)	Level 1 (60-69%)	Level 2 (70-79%)	Level 3 (80-100%)
Safety and Protocol Adherence	Fails to follow safety protocols; ignores use of PPE.	Demonstrates basic understanding of safety protocols; minor lapses in PPE usage.	Consistently follows safety protocols; correctly uses PPE with minor errors.	Exemplary adherence to all safety protocols; flawless use of PPE.
Equipment Proficiency	Unable to operate basic lab equipment properly.	Operates basic lab equipment with assistance; some errors.	Operates all basic lab equipment independently with minor errors.	Demonstrates mastery in operating all basic lab equipment flawlessly.
Technique Accuracy	Techniques are incorrectly performed; significant errors in measurements.	Basic techniques are performed with some accuracy; occasional errors in measurements.	Performs techniques accurately; measurements are mostly precise.	Executes all techniques with high precision; measurements are exact.
Synthesis Execution	Fails to complete the synthesis; no understanding of the process.	Completes the synthesis with significant help; limited understanding.	Successfully performs synthesis with some guidance; good understanding.	Independently performs synthesis flawlessly; demonstrates deep understanding.
Analysis and Reporting	No analysis or report; or fails to submit a report.	Basic analysis with a report that lacks depth; significant errors or omissions.	Good analysis and well-structured report; minor errors or omissions.	Comprehensive and insightful analysis; report is detailed, clear, and well- organized.

We now have a rubric generated by ChatGPT. You can edit the prompt to your liking by adding further details such as editing the number of levels, categories, and more.





EXAMPLE 3: MARKETING & PR COURSE

In this example, we will be using ChatGPT 4 to generate assignment details, learning objectives, and rubrics for a marketing and public relations course.

To begin, we will attach the course syllabus to our initial prompt.



Here, we have given ChatGPT a file of our syllabus, the AI will then train itself on the information, allowing us to ask for additional context, and generate responses based on this document. Next we want to ask it for a breakdown of the assignments in this syllabus, to confirm that the AI understands the content, and so we can generate actual activities from them.



ChatGPT

The assignments in the syllabus for the Marketing and Public Relations course are broken down as follows:

- 1. **Participation and Engagement (10%)**: This involves active involvement in class discussions and activities.
- 2. Weekly Reflections/Assignments (20%): These are assignments given on a weekly basis related to the course material.
- 3. **Midterm Exam (20%)**: A mid-term examination to assess understanding of the first half of the course.
- 4. **Group Project (PR Campaign) (30%)**: Students will work in groups to create a Public Relations campaign, applying the concepts learned in the course.
- 5. Final Exam (20%): An examination at the end of the course covering all the material taught.

These assignments are designed to provide a comprehensive understanding of both

After asking ChatGPT for the breakdown, we can see here that it has taken all the assignments, as well as the information and grading weights into account. Now we can start generating the activities, learning objectives, and rubrics for these specific assignments.

Let's start by making assignment #4, Group Project (PR Campaign) (30%):

C) You

I want you to generate an activity outline for me, based on assignment #4. Ensure that it follows the learning objectives stated in the course syllabus, and that it is related to the details of the assignment. Give me a simple short outline.





As you can see, ChatGPT has given us a simple outline of how the activity can look like. This is great as a starting point, but we want to go further and ask ChatGPT to actually create an assignment that we can use as a template.

Now, we will go further and ask ChatGPT to make an entire assignment from this quick outline made:

c) You

I want you to generate the entire activity for my students. Ensure that it follow the learning objectives stated in the course syllabus, and that it is related to the details of the assignment.



Assignment Title: "Designing a Comprehensive PR Campaign"

Objective: To develop a strategic Public Relations campaign demonstrating understanding of marketing and PR principles.

Assignment Details:

- 1. **Group Formation and Roles:** Form groups of 4-5 students with assigned roles (e.g., strategist, researcher, content creator, media liaison).
- 2. **Company/Brand Selection:** Choose a real or fictional company/brand, analyze its market position, challenges, and opportunities.
- 3. **Research and Analysis:** Conduct thorough research on the industry, competitors, target audience, and past PR campaigns.
- 4. Deliverables:
 - **PR Strategy Document:** Outline the overall PR strategy addressing the identified challenges and opportunities.
 - Press Release: Write a press release for a new initiative or product.
 - * Social Media Plan: Develop a detailed social media strategy.
 - * Crisis Communication Plan: Create a plan for managing potential PR crises.
 - * Campaign Presentation: Prepare a comprehensive presentation of your campaign.
 - **Final Report:** Submit a report covering research, strategy, campaign elements, and reflections on the PR principles.
- 5. Peer Review: Engage in a peer review process for constructive feedback.

Resources Needed:

- Access to research materials (journals, market reports, online databases).
- Tools for creating presentations and documents (PowerPoint, Word, etc.).

Evaluation Criteria:

- Creativity and strategic thinking in campaign design.
- Realism and effectiveness of PR tactics.
- Quality of presentation and written materials.
- · Ethical considerations in PR strategies.

Submission Deadline: [Specify the deadline]

This assignment integrates practical application with theoretical knowledge in PR, aiming to enhance students' skills in strategic thinking and campaign planning.



From our prompt, ChatGPT has created an entire activity for the assignment, including details, deliverables, objectives, and criteria. It is important to note that this is great as a starting point, but should be edited manually in-order to meet the requirements for your course.

Now, let's create learning objectives for this assignment, that relate to the course syllabus.



ChatGPT has now created learning objectives based on the details from the assignment previously generated, and the syllabus we uploaded in the beginning.

Finally, we need to generate a rubric for students to use.



C You

Please generate a rubric based on the assignment you created. Ensure it uses levels 0-3, and is in chart format

Criteria	Level O (Incomplete)	Level 1 (Basic)	Level 2 (Proficient)	Level 3 (Exemplary)
PR Strategy Development	No strategy presented.	Strategy lacks clarity and detail.	Strategy is clear, but lacks some details.	Strategy is comprehensive, clear, and well- detailed.
Creativity and Innovation	No creative elements.	Minimal creativity in campaign elements.	Good creativity and innovation shown.	Exceptional creativity and innovation in all aspects.
Research and Analysis	Inadequate research.	Basic research but lacking depth.	Good research and analysis of information.	In-depth research and insightful analysis.
Campaign Execution	No execution of campaign elements.	Basic execution, but lacks cohesiveness.	Well-executed campaign with minor gaps.	Flawlessly executed with high professionalism.
Communication and Presentation	No presentation or poor communication.	Basic presentation, lacks engagement.	Good presentation, clear communication.	Exceptional presentation, engaging and professional communication.
Teamwork and Collaboration	No evidence of teamwork.	Minimal collaboration among team members.	Good teamwork and collaboration.	Excellent teamwork, with effective role distribution.
Ethical Considerations	Ignores ethical considerations.	Basic understanding of ethics, but not fully integrated.	Good incorporation of ethical considerations.	Exceptionally well-integrated ethical considerations.
Peer Review and Reflection	No engagement in peer review.	Minimal engagement, limited reflection.	Constructive engagement and thoughtful reflection.	Exceptional engagement in peer review, insightful reflection.

We now have a rubric generated by ChatGPT. You can edit the prompt to your liking by adding further details such as editing the number of levels, categories, and more.



SUMMARY OF PROMPTS

Here is a list of steps, and prompts that you can use for reference when creating activities, learning goals, and rubrics for your courses.

- Upload your course syllabus, and ask ChatGPT for a breakdown a. "Give me a breakdown of the assignments listed in this rubric"
- Select which assignment to create an activity for, and ask ChatGPT to do so a. **"Please create an activity based on assignment # stated in the syllabus"**
- If ChatGPT gives you an outline, ask it to go further and generate the entire assignment for you
 - a."Please generate the entire assignment for me, one that I can use in my class. Include deliverables, deadlines, and everything students might need to complete the assignment."

- Ask ChatGPT to generate learning objectives,
 - "Please generate learning objectives for me, based on the assignment you created, and the course syllabus."
- Ask ChatGPT to create a rubric
 - "Please generate a rubric based on the assignment you created. Ensure it uses levels #-#, and is in chart format.

When using prompts in ChatGPT, a good practice is to be as specific as possible to ensure it performs every action you want.

Refer to previous entries that ChatGPT generated, and upload any files, information, and references you want ChatGPT to be trained on so that it can provide you the most optimal output.



Do all of this with Kritik's AI-Activities and Rubrics Generator, where all you need to do is upload your syllabus, and you can create an infinite amount of assignments and rubrics for FREE. <u>Try it now!</u>





WHAT IS KRITIK?

Kritik is a peer assessment platform that increases student engagement and decreases the grading and administrative burden for instructors.

Kritik offers a **360-degree peer feedback loop** for students who can evaluate their 'peers' work based on a rubric provided by the instructor. All peer evaluations are anonymized, so that students can focus on learning by reading each others' work and writing constructive feedback to their peers.

Kritik has many Al-driven features including:

- <u>Al-generated activities</u>
- <u>AI-Rubric builder</u>
- <u>AI-Plagiarism Detector</u>

INTERESTED IN MORE AI RESOURCES?

Check out our catalogue of AI resources that we have curated:

- <u>5 Activity Types Designed using Generative AI</u>
- Guide to AI Plagiarism in Higher Education
- Guide to ChatGPT in Higher Education
- Harnessing ChatGPT for Productivity (Part 1).
- Harnessing ChatGPT for Productivity (Part 2).

TRANSFORMING STUDENTS INTO CRITICAL THINKERS

Kritik is the #1 peer learning platform to engage students, increase student interactions, and reduce turnaround time on feedback.











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