

HOW TO REDESIGN A COLLEGE COURSE USING NCAT'S METHODOLOGY

XII. Planning and Implementing the Redesign: A Timeline and Checklist

Implementing a course redesign involves four phases: (1) planning and development, (2) conducting a pilot term, (3) making revisions to the redesign plan as needed based on the pilot experience, and (4) fully implementing the redesign in all sections of the course, including assessing and evaluating the full implementation.

Based on the nearly 200 redesigns that NCAT has conducted, a reasonable timeline for completing these four phases is as follows:

• Six Months Prior to the Pilot Term. Take six months to plan and develop, during which teams engage in concrete preparation for a pilot term.

Once the decision has been made to redesign a course, the team should develop a concrete plan that addresses the topics discussed in Chapters I to XI. (Chapter XIII describes what a plan should include.) Once a solid, well-articulated plan with the appropriate approvals and any needed funding is in place, concrete action to prepare for the plan is needed. The checklist found later summarizes the items that need to be addressed in the planning and development phase.

• Spring Term. Pilot the redesign with a subset of students and include all or almost all aspects of the redesign.

NCAT recommends that every large-scale redesign conduct a pilot before moving to full implementation. What do we mean by a *pilot*? A pilot involves testing the redesign ideaincluding most if not all of the important quality improvement and cost-savings characteristics of the planned redesign—with a subset of students enrolled in the course. Enrollment in the pilot section(s) needs to be large enough so the redesign team can learn what problems students are likely to face and how to resolve them prior to scaling up to full implementation in all sections of the course. The pilot period provides an opportunity for the redesign team to uncover technology issues or any problems that might emerge involving the newly designed assignments or activities. For some institutions, the pilot term also provides a time to collect consistent data on student learning from both traditional and redesign sections that can be compared when consistent historical data are not available. For many institutions, the pilot has provided a time to make sure (1) that important audiences both on and off campus have been informed of changes in the course and (2) that all potential bumps in the road have been smoothed. Overall, a pilot provides the redesign team with a dress rehearsal of the redesigned course and an opportunity to resolve any issues that may arise. Teams have learned that it is much easier to solve problems with 150 to 200 students rather than with 1,000 students.

• Summer Term. Continue implementing the redesign with all students in the summer term while resolving issues that arose in the pilot.

Conducting the pilot in the spring term gives the team time during the summer to address issues that may have arisen in the pilot. Inevitably, you will need to tweak the redesign so

that any problems encountered can be resolved. The team may need to modify and/or add policies and procedures to address issues that emerged during the pilot. Training plans may need additional refinement to include any new policies or procedures that were adopted during the pilot. The team should also check with other offices on campus to resolve any difficulties other offices may have encountered. Some institutions have conducted focus groups with students to uncover problems that can be corrected during this period.

• *Fall Term.* Fully implement the redesign with all students enrolled in the course and include all aspects of the redesign.

A goal of course redesign is to include under the redesign model all of the institution's students who are enrolled in the course. NCAT calls the first term when this occurs *full implementation* of the redesign. All students benefit from the new learning environment, and both students and the institution benefit from reduced costs. Course policies and procedures are consistently applied to all students, and all students have an increased opportunity to succeed. There may be some modifications of the policies and procedures, but they will likely be minimal if the team has carefully thought through its plan and made corrections after the pilot.

Planning and Implementation Checklist

The following set of questions, organized according to the Essential Elements of Course Redesign, serves as a checklist to ensure that all aspects of a good redesign have been addressed prior to the pilot term. If you are able to answer each of these questions thoughtfully and concretely, your plan has an excellent chance of achieving its academic and financial goals and its benefits for students, faculty, and your institution. Some institutions have assumed that once they've addressed each of the questions, the redesign activity is over. However, that assumption is mistaken: these questions need to be (1) actively addressed in the planning phase, (2) implemented in the pilot, (3) reviewed and modified during the revision stage, and (4) carefully monitored and updated in future terms. Ongoing attention to these ideas will sustain the redesign and help ensure its effective continuation.

Element #1: Redesign the whole course and establish greater course consistency.

- Do you intend to redesign the whole course?
- How will you establish greater course consistency?
- Which redesign model do you intend to use? Why have you selected it?
- Has the importance of consistency for all students been clearly established among all faculty—both full-time and adjuncts? How will that consistency be ensured?
- How will you build and maintain consensus among the multiple redesign stakeholders?
- How will you prepare students and their parents for transition from the traditional format to the redesigned format?
- Has a course coordinator been identified? Have the coordinator's responsibilities been specified?
- Have a training plan and a schedule been established for full-time and adjunct faculty?
- How do you plan to move beyond the initial course design team and enlist other faculty in teaching the redesigned course?

Element #2: Require active learning.

- How will students be actively engaged with course content?
- How many lab/classroom hours will be required each week?

• Do faculty members understand how their roles will change under an active-learning model?

Element #3: Increase interaction among students.

- How will you increase interaction among students?
- Have you thought about incorporating small-group activities that can take place in the lecture hall? in the classroom? in the lab? online?
- Who is going to lead and monitor small-group activities? Have you thought about alternative staffing strategies?

Element #4: Build in ongoing assessment and prompt (automated) feedback.

- How do you plan to incorporate ongoing assessment and prompt feedback for students?
- Do you have a plan to automate grading when possible, such as grading of low-stakes quizzes and homework exercises?

Element #5: Provide students with one-on-one, personalized, on-demand assistance from highly trained personnel.

- How will you provide students with more-individualized assistance? Who will do this and how?
- Have you considered the use of various kinds of personnel who can provide needed student assistance and complete administrative tasks, such as undergraduate peer tutors, graduate teaching assistants, course assistants, and tutors? Who will do what?
- How will you select, orient, and train personnel both initially and on an ongoing basis?

Element #6: Ensure sufficient time on task.

- How will you ensure that students spend sufficient time on task?
- Do you plan to develop materials in addition to the software (notebooks, directions, task lists) to help keep students on task? Have the materials been reviewed for completeness and clarity?
- Do you have a clear timeline and weekly schedules for students that will enable students to finish on time?

Element #7: Monitor student progress and intervene when necessary.

- How will you monitor student progress? How will you deal with students who are falling behind?
- Have you investigated how the software can monitor and track student performance and support course administration?

Element #8: Measure learning, completion, and cost.

- Have you selected a method for obtaining data that will compare student learning outcomes during the pilot and full-implementation phases?
- Will you be able to use existing traditional data, or will you collect parallel data from the traditional and redesigned sections during the pilot term?
- Which of the four measurement methods will you use in each phase?
- Have you decided how you will implement your assessment plan, including working with others who may need to collect or analyze data?
- Have you investigated whether the traditional format contained grade inflation?
- Have you selected a cost reduction strategy to be used in the redesign?
- Have you completed the assessment-planning forms, the completion forms, and the Cost Planning Tool to document your plans?

Building Consensus among All Stakeholders

From its involvement in more than 200 course redesigns, NCAT has found that the mostimportant implementation issues revolve around building and maintaining a consensus about the redesign among all stakeholders: students, parents, faculty, professional staff, and senior administrators. The need to develop shared understanding of the redesign begins with developing a redesign plan; it continues through the pilot as the redesign plan becomes "real"; it becomes even more necessary during full implementation as more students, more faculty, and more staff become involved; and, equally important, it continues to be maintained on an ongoing basis.

Chapter XIII discusses in detail the issues of consensus and shared understanding and emphasizes sustaining consensus, but it is important for you to consider during the planning period. Having a great plan is not enough; there must be consensus among key stakeholders about that plan. You need to think about building initial consensus by focusing on answering the following questions.

- How will you prepare students and their parents for transition from the traditional format to the redesigned format?
- How do you plan to achieve faculty consensus about the redesign?
- How do you plan to achieve departmental commitment to the redesign?
- How do you plan to achieve commitment and cooperation from campus offices that will be affected by the redesign, such as the registrar, financial aid, information technology, facilities, and advising?
- How do you plan to achieve commitment and support from administrators?
- What strategies do you have in place to orient new personnel in college offices and at senior administrative levels?