

**Appendix E. Generated major categories and categories on reported new strategies learned and potential for adoption, and examples of participants' responses**

Major Categories (N = Responses, %)	Subcategories (N = Responses, %)	Selected Participants' Responses
Higher-Order Study Strategies (N=453, 48.3%)	<p><i>Reflective learning</i> (N=307, 67.8%)</p>	<p>-Whenever I read through sections in the textbook, I will ask myself what I remember from the text.</p> <p>-As new topics are taught I will go through and ask myself the questions the where mentioned and use that to gauge how much I understand the concepts and to figure out what I need help on.</p> <p>-After reading, I will retrieve all the new information from my memory and write them down as notes.</p> <p>-In order to incorporate the strategies in the metacognitive strategy lecture, I will ask myself the questions, what I need to know and what I already know about a particular problem assess what I'm doing the whole time, and monitor it as well.</p> <p>-I will also take time after class to think about what I learned in class and what I did not understand and the things I didn't understand will be a priority to get help on or look back at my notes to try and figure it out.</p> <p>-I will ask myself questions about the material learned each day being aware of the information I am retaining about the topic.</p> <p>-When I am studying, I am going to incorporate the metacognitive strategies such as asking myself questions to become aware of where my mind stands with the task.</p> <p>-I am going to use the strategies nightly to reflect and recall information covered in the lecture and the textbook.</p>
	<p><i>Collaborative learning</i> (N=59, 13%)</p>	<p>-I am going to start studying with friends and classmates more and hopefully see some good progress.</p> <p>-To incorporate the group study strategy that I learned I will seek friends in the class who will make good study partners and form a group.</p> <p>-I plan to try studying with some friends this semester. We have been talking about meeting at certain times during the week to study at the library.</p> <p>-Going over the test with a friend will be very helpful to me.</p> <p>-Finding a responsible group to study with is a very good idea also.</p>

Appendix E (Continued)

Major Categories (N = Responses, %)	Subcategories (N = Responses, %)	Selected Participants' Responses
Higher-Order Study Strategies	<i>Self-assessment (N=57, 12.6%)</i>	<ul style="list-style-type: none"> <li>-Like, test myself on what I know by creating quizzes to evaluate how well I am studying and if I am understanding the material presented to me.</li> <li>-Following that, I will monitor my progress by self-testing as well as quizzing myself to check my retention of the information.</li> <li>-Then I will evaluate how well I know the information that I just learned.</li> <li>-Assess what I'm doing the whole time, and monitor it as well.</li> <li>-Then begin to quiz myself on the material.</li> </ul>
	<i>Practice problems (N=30, 6.6%)</i>	<ul style="list-style-type: none"> <li>-If there are equations or problems that need to be solved (math, chem), I need to be able to do practice problems.</li> <li>-For this class, I plan on studying by doing many practice problems.</li> <li>-I feel like I need to do more practice problems to understand the concepts rather than working them out multiple times and reworking my brain to adapt to understanding how to solve an individual problem.</li> <li>-I should practice more review questions.</li> <li>-Working through problems and ideas rather than remembering facts.</li> </ul>
Time Management and Planning  (N=325 responses, 34.7%)	-	<ul style="list-style-type: none"> <li>-Once I identify the test date I then need to go on to my schedule and plan study times in moderate increments so that I can take my time absorbing the information instead of reading the text before the test, I should read it as we learn about it in class.</li> <li>-I think the best thing for me would be to use a well-structured planner so I can know what I have coming up week by week.</li> <li>-I need to create a more solid tight plan that wouldn't allow me to procrastinate</li> <li>-I should also plan out what I am going to study to make sure I can focus on those tasks while I am there.</li> <li>-I didn't know that it was in my best interest to plan and set goals for myself before the lecture.</li> <li>-I also learned that I need to make sure I have had enough time to study for an exam so that I will know the content.</li> <li>-I need to schedule out time in my calendar to complete assignments and study. Scheduling it out would help me actually, I think, get more done in a shorter amount of time.</li> </ul>

## Appendix E (Continued)

Major Categories (N = Responses, %)	Subcategories (N = Responses, %)	Selected Participants' Responses
Utilizing Outside-Class Resources (e.g., Educational Videos, Office Hours, Supplemental Instruction (SI) Sessions (N= 65 responses, 6.9%)	-	<ul style="list-style-type: none"> <li>-I plan on going to an SI leaders /LASSO about once a week.</li> <li>-I will actively go to the SI sessions.</li> <li>-I think I need to start going to tutoring or my professor's office hours when I need help with something or don't understand a concept.</li> <li>-I will be talking to the teacher after class about concepts that I may have been confused about or did not understand.</li> <li>-I should take better advantage of outside sources such as tutors.</li> <li>-I need to utilize multiple resources such as watching videos or going to study sessions.</li> </ul>
Studying with Notetaking (N=51 responses, 5.4%)	-	<ul style="list-style-type: none"> <li>-Taking notes while reading beforehand will also beneficial to my learning experience. The new strategies I learned, were good note taking, paying attention to detail.</li> <li>-I learned to take notes even when I'm reading the book because just reading the information does not mean that my brain is retaining the information.</li> <li>-I need to take notes as I am reading the textbook, that way I am can look back at something that I may have forgotten about.</li> </ul>
Rote Memorization (N=43 responses, 4.6%)	<i>Reading and rereading (N=24, 55.8%)</i>	<ul style="list-style-type: none"> <li>-I will also make sure if I go back and re-read my Chemistry textbook or previous notes that I will take new notes</li> <li>-I will read the information several times over until it is committed to long term memory.</li> <li>-I feel the repetition would embed the information into my brain therefore I would perform well on the exams.</li> </ul>
	<i>Flash Cards, notecards, and quizlets (N=13, 30.2%)</i>	<ul style="list-style-type: none"> <li>-I could also use Quizlet's software to help quiz myself over topics.</li> <li>-I should start making flashcards because when I use them I have a better understanding of the subject I am studying.</li> <li>-To make note cards to study better for a test or just going over a homework problem</li> <li>-I should make flashcards instead of reading the material a bunch because you learn better when you write things down over and over.</li> </ul>
	<i>Memorization/cramming (N=6, 14%)</i>	<ul style="list-style-type: none"> <li>-This [memorization] will help improve my abilities to recall what I have learned and store it into my long-term memory.</li> </ul>