



**CALIFORNIA STATE SCIENCE FAIR  
2002 PROJECT SUMMARY**

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<b>Project Title</b> <b>Virtual FlashCards</b>	
<p style="text-align: center;"><b>Abstract</b></p> <p><b>Objectives/Goals</b> The primary objective of developing the Win32 program, Virtual FlashCards was to create a more active flashcard-style learning environment in which interaction is a part of learning and to provide instantaneous feedback on learning progression. Secondary goals included harnessing the power of computers to maximize study efficiency by, for instance, changing the frequency a card is viewed based on the user's knowledge of the card. In accomplishing these goals, the program was designed for ease of use, customization, expandability and quick Internet distribution.</p> <p><b>Methods/Materials</b> The program is designed for ease of use, customization, expandability and quick Internet distribution. Furthermore, algorithms cull and sort FlashCards, changing the frequency a card is viewed based on the user's knowledge of the card. Programmed in Microsoft Visual Basic 5, the code structure revolves around a core class model allowing for easy expandability and quick debugging. Once the core classes were completed, the secondary functions (printing, saving, etc) and the UI were programmed. Finally, the program was packaged for distribution and web site was created allowing the download of VFC as well as the ability to swap flashcards users have made.</p> <p><b>Results</b> The program has been very helpful for thousands of people. With no promotion, well over a thousand people download VFC a month and use it to study a plethora of subjects. User testimonials indicate the objectives were achieved (91% offer praise) and numerous user suggested features are found in this version or will be incorporated into a planned second version.</p> <p><b>Conclusions/Discussion</b> Considering numerous people have testified to the helpfulness of VFC, and commented on the usefulness of many of its objectives, the program has been a success that has truly helped people study.</p>	
<b>Summary Statement</b> Virtual FlashCards is a program to create, learn, share and print FlashCards	
<b>Help Received</b>	