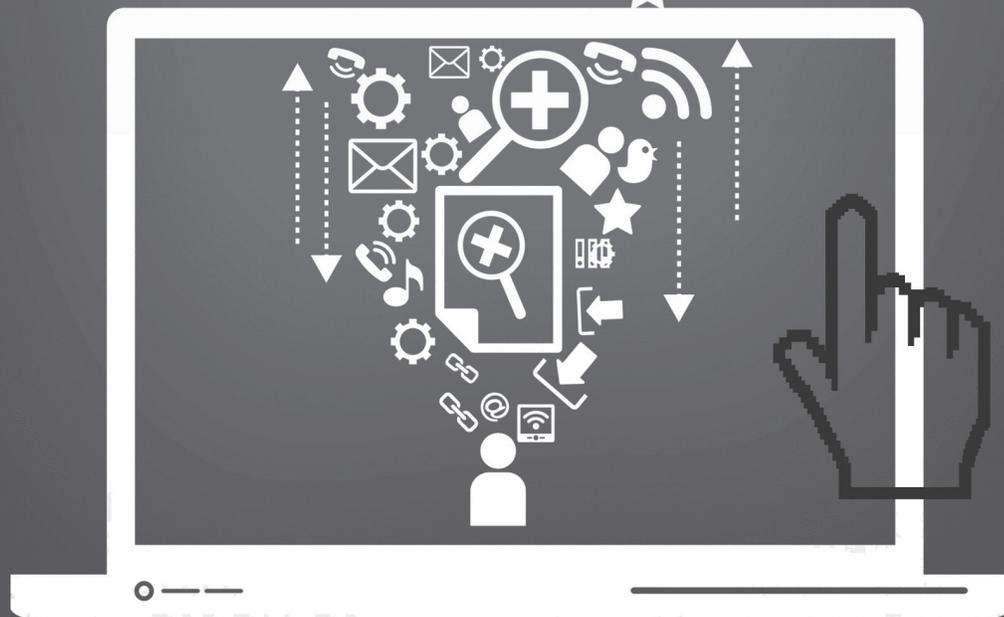


Session 6

Collaboration Tools



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Session 6

Collaboration Tools

Objectives

1. Participants will understand how different collaborative tools can be used in the classroom to enhance the learning experience.
2. Participants will sample a variety of types of collaborative tools.
3. Participants will find appropriate collaborative tools to use in the classroom.

Facilities

- A room with Internet access, a data projector, speakers, tables, and space for participants to spread out in groups and work comfortably
- Electricity as required for powering participants' computers

Equipment/Materials

- Computer with Internet access and data projector for facilitator
- Laptop computers with Internet access (1 per participant)

Software

Computers should have current installations and updates of

- Java
- QuickTime
- Flash

Facilitator Preparation

- Read the session guide and familiarize yourself with the activities and Handout 1.
- Upload Handout 1 to Google Docs for participant access during the session.



Participants
Up to 25 teachers



Time Required
3 hours

Handouts

- 1: Collaboration Tools

- Familiarize yourself with all software used in the session, such as Google Docs.
- Preview all websites used in the session to ensure the links are current. Bookmark each site.
- Ensure adequate numbers of materials for all participants and groups.
- Ensure that all participants have an e-mail account they can access online. Make sure you have participants' e-mail addresses when you are preparing for the sessions.
- If you have not done so previously, prepare a Google Docs site for the participants to post files and send an invitation to all of the participants to access the site. Please note that Google Docs is soon changing to Google Drive. Exact instructions for accessing and using the software may change.
- Review the BSCS 5Es Instructional Model (see Session 1: Handout 1).
- Review the related Texas Essential Knowledge and Skills (TEKS) Technology Applications standards listed at the end of this session.

Prerequisite Skills of Participants and Facilitator

- Basic computer skills
- Thorough understanding of Web navigation
- Solid understanding of the capability and utility of all software and websites used in this session (facilitator)

Grouping Strategy

Use a heterogeneous grouping strategy. Ensure that each group of three to four members includes both math and science teachers as well as elementary school teachers who teach in self-contained classrooms.



Session Sequence

The sequence of activities in this session will give participants introductory experiences with and knowledge of online resources and tools to help them collaborate and share lessons, resources, and experiences.

Participants will begin the session by becoming familiar with Google Docs as a means to collaborate online. Then, using Google Docs as the vehicle, participants will investigate and utilize a variety of collaboration tools suggested in Handout 1. The activity will conclude with small-group presentations intended to share the learning with all participants.



Whole Group

Equipment/Materials

- Computer with Internet access and data projector for facilitator
- Laptops with Internet access (1 per participant)

1. For this project, participants will use the free software Google Docs. Explain that several similar collaboration and file-sharing products are available, both free and commercial. For this session, however, participants will use this program, which is part of a suite of Web 2.0 tools available with a free Google account.
2. Tell participants, *“We used the Google Docs spreadsheet in the previous session. In this session, we will explore how to use other aspects of Google Docs to work and collaborate online in real time.”*

The session will likely include participants who are familiar with Google Docs and use it regularly as well as others who have limited knowledge of it. Take a poll via a show of hands and ask who has a thorough knowledge of Google Docs. Based on the results, arrange the table groups so that each one includes a Google Docs “expert.”

If not enough experts are available, ask for volunteer experts to come to the front of the room to show the whole group how to do various activities in Google Docs, as listed in the next step. Encourage the small groups to follow along at the computers at their tables.

Table Groups

3. Ask each expert to explain to the other group members what Google Docs is and how it can be utilized. In addition, ask the experts to explain how to
 - Create an account
 - Log in
 - Create different kinds of documents
 - Upload a pre-existing document
 - Share a document with others

Encourage group members to ask questions about any aspect of the Google Docs tool that is still unclear.

4. Ask if there are any additional questions that were not addressed in the table group conversations. Respond accordingly.



Table Groups

5. Say, “Even with this basic knowledge, you need practice to become comfortable using Google Docs for real-time collaboration.”

Before starting, ensure that each participant has an e-mail account they can access online. If not, have them use a site such as Google, Hotmail, or Yahoo to create one.

6. Have one participant in each group log in to a Google account and access Google Docs. The participant should then do the following:
 - a. Create a new document and write the first sentence of a story, such as, “A magnetic and electrifying party was taking place in the science lab.”
 - b. Share the document and send invitations by e-mail to the other members of the group to access it.
7. Have the other group members use the e-mail invitations to each access the document from their own laptops.
8. Another person in the group should now continue the story by adding one sentence to the document. Each group member in turn should repeat the process until everyone at the table has contributed to the document.
9. Participants will see all the text appear in the document on their laptops as it is being written.

Equipment/Materials

- Computer with Internet access and data projector for facilitator
- Laptops with Internet access (1 per participant)

Whole Group

10. Invite group participants to share any insights or Google Docs experience they gained while creating and editing the shared document.
11. Ask for examples of how this tool may be used with students.



Individuals

12. Announce that by having an understanding of how real-time collaboration works, the participants can begin the real work of the session. Provide each participant with an electronic copy of Handout 1: Collaboration Tools.
13. Have each group member select two collaborative tools from each category on the handout to explore. Make sure all group members are investigating different tools to avoid duplicating work.

Equipment/Materials

- Laptops with Internet access (1 per participant)
- Handout 1: Collaboration Tools (1 electronic copy per participant)

14. Allow 10 minutes for individual investigations.

Table Groups

15. Have each group member present a short oral description of the two tools he or she investigated to the rest of the group.

Whole Group

16. Invite participants to share with the whole group any insights they gained during the oral reporting.



Equipment/Materials

- Laptops with Internet access (1 per participant)

Individuals

17. Give participants 20 minutes to create brief reports of the tools they investigated above. Each report should provide the following:

- Short synopsis of the tool
- Ways to use the tool in a classroom setting
- Possible barriers to the tool's use

18. Encourage participants, as they are creating these reports, to include screenshots, images, links to tutorials, or anything else that might give other users worthwhile information.

19. Ask each participant to post the two reports on the facilitator's Google Docs site. Make sure each participant received the e-mail invitation to the site.



Equipment/Materials

- Laptops with Internet access (1 per participant)

Table Groups

20. After everyone has posted the two reports on Google Docs, ask participants to reform their groups.

21. Group members are to trade reports so that each member has two reports that are different from his or her assigned tools.

22. Each member should take 20 minutes to do additional research on the tools, access the reports on Google Docs, and make additions as needed to the two reports. The additions should include at least one new idea about how the tool might be used with students.

23. At this point, each group should now have a set of reports on Google Docs that can be identified as belonging to the group via the document names.
24. Ask each group to access another table group's reports on Google Docs.
25. As a team, each group will have 20 minutes to add more information to the other group's reports.

Whole Group

26. When the groups are finished with this task, invite participants to share with the whole group any insights they gained in the collaborative process and the Google Docs experience.
27. Encourage participants to access the posted reports after the session to continue to review, refresh, and reinforce their knowledge of the reviewed tools. In addition, encourage participants to continue to add reports of more tools to the site.

Technical Assistance Follow-Up

The technical assistance provider will ensure that all school groups access, review, and add reports of additional tools or updated versions of tools previously reviewed. This continued experience and improved expertise is essential to the next session, which will involve utilization of collaboration tools through practical classroom application.



Texas Essential Knowledge and Skills (TEKS)

The participants will identify the TEKS or standards that relate to this session as they select the focus of their study. Watch for and facilitate discussions about the need to avoid “stretching” the standards beyond what is intended. This effort would not be an appropriate use of the students’ learning time.

§126.3. Technology Applications, Grades 3–5.

(b) Knowledge and skills.

- (6) *Information acquisition.* The student evaluates the acquired electronic information. The student is expected to:
 - (A) apply critical analysis to resolve information conflicts and validate information;
 - (B) determine the success of strategies used to acquire electronic information; and
 - (C) determine the usefulness and appropriateness of digital information.
- (7) *Solving problems.* The student uses appropriate computer-based productivity tools to create and modify solutions to problems. The student is expected to:
 - (A) use software programs with audio, video, and graphics to enhance learning experiences;
 - (B) use appropriate software to express ideas and solve problems including the use of word processing, graphics, databases, spreadsheets, simulations, and multimedia; and
 - (C) use a variety of data types including text, graphics, digital audio, and video.
- (8) *Solving problems.* The student uses research skills and electronic communication, with appropriate supervision, to create new knowledge. The student is expected to:

- (A) use communication tools to participate in group projects;
 - (B) use interactive technology environments, such as simulations, electronic science or mathematics laboratories, virtual museum field trips, or on-line interactive lessons, to manipulate information; and
 - (C) participate with electronic communities as a learner, initiator, contributor, or mentor.
- (10) *Communication*. The student formats digital information for appropriate and effective communication. The student is expected to:
- (A) use font attributes, color, white space, and graphics to ensure that products are appropriate for the defined audience;
 - (B) use font attributes, color, white space, and graphics to ensure that products are appropriate for the communication media including multimedia screen displays, Internet documents, and printed materials; and
 - (C) use appropriate applications including, but not limited to, spreadsheets and databases to develop charts and graphs by using data from various sources.
- (11) *Communication*. The student delivers the product electronically in a variety of media, with appropriate supervision. The student is expected to:
- (A) publish information in a variety of media including, but not limited to, printed copy, monitor display, Internet documents, and video; and
 - (B) use presentation software to communicate with specific audiences.

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References

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