Module Four
Evaluation

Time

The anticipated time for the module is 4 hours.

Learning Objectives

Participants will be able to

- Understand the purposes of evaluation
- Distinguish between research and evaluation
- Understand the key components of evaluation
- Use a logic model as a guide to create an evaluation plan

Identifying Evaluation Stakeholders

Stakeholders	Interests	Priority Ranking	
		Program	Evaluation

Benefits of a Logic Model

1. A logic model develops understanding. It helps build understanding, if not consensus, about what the program is, what it's expected to do, and what measures of success will be used.

2. A logic model helps to monitor progress. It provides a plan against which you can keep track of changes so that successes can be replicated and mistakes avoided.

3. A logic model serves as an evaluation framework. It enables you to identify appropriate evaluation questions and relevant data.

4. A logic model helps to bare assumptions. It helps you be more deliberate about what you're doing and to identify assumptions that may need validating.

5. A logic model helps curb overpromising. It helps you realize the limits and potential of any single program.

6. A logic model promotes communication. It creates a simple communication piece for portraying and marketing a program.

Designing a Logic Model

A. What substance-abuse or related problem will you address?
(goals)

You will first need to identify the substance-abuse or related problem you want to address. If you've done a needs assessment, prioritized your data, and identified resources, you should have a good idea of the substance consumption or substance-abuse consequence that is important for your program to address.

B. What risk and protective factors will you address?
(intervening variables)

The second thing you need to know is which intervening variables (e.g., risk/protective factors) apply to the goal you've selected. You will need to consult the research literature to determine which variables affect the substance-abuse or related problem you are addressing.

C. Who will participate in, or be influenced by, the program?
(focus population)

Who is your focus population? That is, who is the recipient of your program or whom do you expect to be influenced by your activities? Will you offer a program to all members of the population or all members of a subgroup? Will you offer a program to a group that is identified as being exposed to particular risks? Or will you offer a program to individuals already experiencing early signs of substance abuse? Answering these questions will help you determine whether you are implementing a universal, selective, or indicated strategy.

D. What services and activities will be provided?
(strategies)

What are the activities involved in your program? That is, what will you actually be doing? It's very important to specify what activities you plan to do; a program that isn't implemented as planned (with fidelity) isn't likely to lead to the expected program outcomes. When recording your planned activities, answer the questions, "What are we going to be doing?" and "When and how much are we going to do it?"

- The answer to the question "What are we going to be doing?" may include providing a mentoring program, delivering a school-based curriculum, developing policy, or delivering a parenting program.

- The question of "When and how much?" refers to when the program or activities will be delivered and how much time these activities will require (e.g., after school every day for 3 hours or a single day for 3 hours).

E. How will these activities lead to expected outcomes?
("if-then" statements)

Identify the assumptions underlying your program. That is, think about why and how program activities are expected to lead to the desired outcomes. A very common problem in prevention programs is that planners often choose program activities and strategies that don't lead logically to the goals or outcomes that the program is intended to achieve. That's why we recommend thinking through your assumptions. Why and how do you expect your program to lead to the desired changes? Your assumptions can be seen as a series of "if-then" relationships.

F. What immediate changes are expected for individuals, organizations, or communities?
(short-term outcomes)

Short-term outcomes are the immediate program effects that you expect to achieve. For example, a life-skills training program is expected to show an increase in students' problem-solving skills when the program is completed.

G. What changes would you like for the program ultimately to create?
(long-term outcomes)

Long-term outcomes are the long-term or ultimate effects of the program. For example, we attempt to increase students' problem-solving skills, the immediate or short-term outcome, because we believe that increasing these skills will ultimately help to prevent or reduce student drug use, which is the expected long-term outcome.

Blank Logic Model

GOALS	INTERVENING VARIABLES	FOCUS POPULATION	STRATEGIES	"IF-THEN" STATEMENTS	SHORT-TERM OUTCOMES	LONG-TERM OUTCOMES
A. To address this substance-abuse or related problem:	B. By addressing these intervening variables (e.g., risk and/or protective factors):	C. For these people:	D. We will do the following program activities/strategies (what, where, and how much):	E. We expect that this activity will lead to changes in these risk/protective factors, which in turn will lead to our program goal:	F. We will know these changes have occurred if:	G. We will know we are reaching our goals if:
1. Logic Model:						

2. Evaluation Questions:

GOALS	INTERVENING VARIABLES	FOCUS POPULATION	STRATEGIES	"IF-THEN" STATEMENTS	SHORT-TERM OUTCOMES	LONG-TERM OUTCOMES

3. Methods:

GOALS	INTERVENING VARIABLES	FOCUS POPULATION	STRATEGIES	"IF-THEN" STATEMENTS	SHORT-TERM OUTCOMES	LONG-TERM OUTCOMES

Sample Logic Model A

GOALS	INTERVENING VARIABLES	FOCUS POPULATION	STRATEGIES	"IF-THEN" STATEMENTS	SHORT-TERM OUTCOMES	LONG-TERM OUTCOMES
A. To address this substance-abuse or related problem:	B. By addressing these intervening variables (e.g., risk and/or protective factors):	C. For these people:	D. We will do the following program activities/strategies (what, where, and how much):	E. We expect that this activity will lead to changes in these risk/protective factors, which in turn will lead to our program goal:	F. We will know these changes have occurred if:	G. We will know we are reaching our goals if:
1. Logic Model:						
Alcohol and tobacco use by students in grades 7 and 8 in XYZ community	Academic failure in late elementary school	Children in grades 1 to 3 at the local elementary school who are struggling academically, as identified by teachers	Tutoring: 3 hours per week for 1 school year: 50 students	If tutoring is offered to students with academic problems, then students will have the opportunity to improve their academic skills. If the students take the opportunity, they will improve their academic skills. If they improve their academic skills, they will not fail in school. If they don't fail in school, they will be less likely to abuse alcohol, tobacco, and other drugs.	Participants' grades improve; participants move to next grade level on time.	Participants do not begin using alcohol, tobacco, and other drugs within 5 years of participating in the program.
2. Evaluation Questions:						
To what extent was alcohol and tobacco use reduced in the target population?	To what extent was academic failure reduced in the target population?	To what extent were the participants children in grades 1 to 3 who were struggling academically?	Did 50 students participate in a tutoring program for 3 hours per week for 1 school year?	To what extent did students who were selected for the program participate? To what extent did the students' academic skills improve?	To what extent did participants' grades improve? To what extent did participants move on to the next grade level?	To what extent did participants use tobacco, alcohol, and other drugs within 5 years of the end of the program?

Sample Logic Model A - continued

3. Methods:						
GOALS	**INTERVENING VARIABLES**	**FOCUS POPULATION**	**STRATEGIES**	**"IF-THEN" STATEMENTS**	**SHORT-TERM OUTCOMES**	**LONG-TERM OUTCOMES**
Existing database at school (student use survey)	Existing database at school (grade records)	Program records from the tutoring program coordinator	Program records from the tutoring program coordinator	Program records from the tutoring program coordinator and surveys of the student participants	Existing database at school (grade records)	Surveys conducted with the student participants (student use survey)

Sample Logic Model B

GOALS	INTERVENING VARIABLES	FOCUS POPULATION	STRATEGIES	"IF-THEN" STATEMENTS	SHORT-TERM OUTCOMES	LONG-TERM OUTCOMES
A. To address this substance-abuse or related problem:	B. By addressing these intervening variables (e.g., risk and/or protective factors):	C. For these people:	D. We will do the following program activities/strategies (what, where, and how much):	E. We expect that this activity will lead to changes in these risk/protective factors, which in turn will lead to our program goal:	F. We will know these changes have occurred if:	G. We will know we are reaching our goals if:
1. Logic Model:						
Tobacco use by young adolescents in Cooltown, USA	Reduce community laws and norms favorable toward tobacco Reduce favorable attitudes toward tobacco	Children and adolescents ages 10 to 13 in Cooltown, USA	Run radio and TV ads after school in 30,000 homes daily for 3 months; display antitobacco billboards to be seen by 1,000 children daily for 3 months; place antitobacco ads in three youth magazines with circulations of 3,000 for 3 months.	If media ads depicting tobacco use as "uncool" are displayed, then children and youth will be exposed to antitobacco messages. If children are exposed to antitobacco messages, then they will view tobacco use as "uncool." If children view tobacco use as "uncool," then they will have attitudes unfavorable to tobacco use. If children have attitudes unfavorable to tobacco use, then they will be less likely to use tobacco.	Children who see the ads report that smoking tobacco is "uncool." Children who see the ads report that they don't intend to use tobacco.	Ninety percent of children and young people exposed to the antitobacco ads do not initiate tobacco use within 6 to 12 months following the media campaign.
2. Evaluation Questions:						
To what extent was tobacco use by adolescents decreased in Cooltown, USA?	To what extent were community laws and norms reduced? Were favorable attitudes toward tobacco reduced?	How many children ages 10 to 13 saw the ads? How often did they see them?	To what extent did antitobacco ads run on radio and TV in 30,000 local homes daily for 3 months? Did antitobacco billboards run for 3 months? Did 1,000 children see them daily? Were antitobacco ads run in three youth magazines with circulations of 3,000 for 3 months?	To what extent did children report having seen the ads? Do young people exposed to the ads have attitudes unfavorable to tobacco use? Are young people exposed to the ads less likely to use tobacco? Which type of advertisement do young people think is most effective in conveying the message?	To what extent did children who saw the ads have changes in perceptions of norms? Do young people exposed to the ads see smoking as more dangerous and less "cool?" Did young people who saw the ads report that they don't intend to use tobacco?	To what extent did children and young people exposed to the antitobacco ads initiate tobacco use within 6 to 12 months following the media campaign?

Sample Logic Model B - continued

3. Methods:						
GOALS	**INTERVENING VARIABLES**	**FOCUS POPULATION**	**STRATEGIES**	**"IF-THEN" STATEMENTS**	**SHORT-TERM OUTCOMES**	**LONG-TERM OUTCOMES**
Student use survey	Community survey and student survey	Program survey	Program records	Program survey and student use survey	Program survey and student use survey	Student use survey

Examples of Evaluation Questions

PROCESS EVALUATION QUESTIONS

1.   How are resources allocated and used to implement activities? For example: staff hours, skills, experience, and training required; budget required; accuracy of planned allocation.

2.   How is the work plan implemented? For example: consistency (comparison of actual activity with planned activity, accuracy of original timeline, degree of adaptation required for each activity); participation rates in key services/activities; attitudes regarding participation in key services/activities; perceived quality of work plan implementation.

3.   What obstacles or barriers were encountered as each activity was implemented?

4.   How did any broad changes in the community change the context in which activities were implemented?

5.   How are preliminary evaluation findings used to improve implementation of activities throughout the project?

OUTCOME EVALUATION QUESTIONS

Examples From a School-Based Program
1.   To what extent has the use of alcohol, tobacco, and other drugs decreased among students over the duration of this project?

2.   To what extent has academic failure been reduced over the duration of this project?

3.   To what extent has school attendance improved over the duration of this project?

4.   To what extent has the number of discipline referrals decreased over the duration of this project?

5.   To what extent has the average number of assets increased among students over the duration of this project?

Examples From a Community-Based Initiative
1.   To what extent can a series of community-wide prevention awareness activities change adult norms about the use of alcohol, tobacco, and other drugs in the community?

2.   To what extent can a series of community-wide prevention awareness activities result in more consistent enforcement of tobacco and alcohol laws and ordinances?

3.	To what extent do community-wide prevention awareness activities and consistent enforcement of tobacco and alcohol laws and ordinances lead to reduced youth access to these substances?

4.	What are the factors that enhance and inhibit efforts to make enforcement of tobacco and alcohol laws consistent?

5.	To what extent do community-wide prevention awareness activities lead to an increase in the number of parents who clearly state their expectations about the use of alcohol, tobacco, and other drugs to their children?

6.	To what extent do community-wide prevention awareness activities lead to an increase in the number of young people who believe adults in the community care about them?

Pros and Cons of Data Collection Methods*

Method	Pros	Cons	Costs	Time to Complete
Archival research	Can provide detailed information about a program	May be difficult to organize	Inexpensive	Time consuming
Archival trend data	Fast, cheap, a lot of data available	Difficult to compare; may not show changes	Inexpensive	Quick
Focus groups	Can quickly get information about needs, community attitudes, and norms; information can be used to generate survey questions	Can be difficult to run (requires a good facilitator) and analyze; may be difficult to gather groups together	Cheap if done in-house; can be expensive to hire facilitator	Groups last about 1.5 hours each
Observation	Can see a program in operation	Requires much training; can influence participants	Inexpensive, requires only staff time	Quick, but depends on the number of observations
Open-ended questions on a written survey	Can add more in-depth information to a structured survey	May not be answered; may be difficult to interpret	Inexpensive	Only adds a few more minutes to a written survey; quick analysis time
Participant observation	Can provide detailed information and an "insider" view	Observer can be biased; can be a lengthy process	Inexpensive	Time consuming
Record review	Objective, quick, does not require program staff or participants; records are preexisting	Records can be difficult to interpret; records are often incomplete	Inexpensive	Takes much time
Self-administered surveys	Anonymous, cheap, easy to analyze; standardized, making them easy to compare with other data	Results are easily biased; surveys miss information; attrition is a problem for analysis	Moderate	Moderate to high
Face-to-face structured surveys	Same as written surveys but allows responses to be clarified	Same as written surveys but requires more staff and time	More than self-administered	Moderate to high
Telephone surveys	Same as written surveys but allows you to target a wider area and clarify responses	Same as written surveys but misses people without phones (low-income)	More than self-administered	Moderate to high
Unstructured interviews	Gather in-depth information that can be used to generate survey questions	Require much time and expertise to conduct and analyze; potential interview bias possible	Inexpensive if done in-house; can be expensive to hire interviewers	Quick, but depends on the number of observations and/or transcribers
Case study	Gather in-depth information about a specific phenomenon or population	Takes much time (often years); limited validity and potential of bias	Can be expensive due to time required	Time consuming

* Based largely on the National Center for Advancement of Prevention's "NCAPTion Training Guide," Spring 2000.

AUDIENCE	METHODS							
	Abstracts & Briefings	Annual/ Evaluation Reports	Fact Sheets	Brochures & Posters	Exhibits	Press Conferences	Press Releases	Town Meetings
Current/ Potential Funder	X	X						
New Potential Funder	X		X					
Administrator	X	X						X
Board Members	X	X	X					X
Community Groups			X	X				X
General Public			X	X	X		X	X
Organizations			X		X			
Media			X			X	X	X

Choosing Appropriate Reporting Methods

Adapted from Borden, DeBord, and Snipes (2004), and Morris, Gibson, and Freeman (1987).

References and Resources

References

Borden, L., DeBord, K., & Snipes, S. (2004). *Beyond data.* Department of Family and Consumer Sciences at North Carolina State University. Available online at www.ces.ncsu.edu/depts/fcs/beyonddata/

Morris, L. L., Gibson, C. T., & Freeman, M. E. (1987). *How to communicate evaluation findings.* Newberry Park, CA: Sage.

Resources

Web sites and Tools
Prevention Platform of the Substance Abuse and Mental Health Services Administration (SAMHSA) (http://preventionplatform.samhsa.gov). The prevention platform site is an excellent resource because it contains useful tools for needs assessment, capacity building, planning, implementation, and evaluation. It is a more recent version of what used to be called "Prevention DSS" and "PrevTech." It includes the following tools related to assessment and evaluation:

- Assessment Tool—Allows you to quickly gather indicator data, build profiles, fill gaps, and determine target groups and modifiable risk and protective factors.

- Create GIS Maps—Allows you to build customized maps to display indicators of prevention needs and resources.

- Evaluation Tool—Allows you to design an outcome or process evaluation. It exports the evaluation plan to an installed database builder. It can also export the plan to a database builder demo for testing purposes.

- Database Builder—Manages large multilevel data collection projects such as statewide systems. Allows you to try out a working demo.

- Measures and Instruments Repository—Contains SAMHSA's national outcome measures for substance abuse prevention, substance abuse treatment, and mental health treatment. Allows you to browse and select from other measures and instruments related to substance abuse and other health and community issues.

- Minimum Data Set (MDS)—Manages the collection of process evaluation data for large multilevel projects such as statewide systems. Allows you to try out a working demo.

- Service and Activity Tracking Tool—Manages the collection of basic process evaluation data (like the MDS tool) in community-level settings. Ready to use immediately.

Prevention Pathways of the Center for Substance Abuse Prevention (CSAP): Online Courses (http://pathwayscourses.samhsa.gov). The courses offer a basic introduction to evaluation to prevention professionals and members of the public. They are designed for people not familiar with the basic concepts of program evaluation. Pathways offers three evaluation courses:

1. Evaluation for the Unevaluated: Program Evaluation 101

2. Evaluation for the Unevaluated: Program Evaluation 102

3. Wading Through the Data Swamp: Program Evaluation 201

American Evaluation Association (AEA) (www.eval.org). The AEA is an international professional association of evaluators. Resources available on their Web site include the following:

- "Guiding Principals for Evaluators," which describes the professional practice of evaluators and what clients and the public can expect from professional evaluators with whom they work.

- A list of local affiliate organizations to help you locate a qualified evaluator appropriate for your project and budget.

- Links to other resources, including independent consultants and evaluation firms, Web resources on evaluation, and online evaluation handbooks and textbooks.

Beyond Data (www.ces.ncsu.edu/depts/fcs/beyonddata/index.htm). This Web-based resource created by the Department of Family and Consumer Sciences at North Carolina State University focuses on understanding needs assessments and evaluation. It includes an information bank that describes a number of data collection methods, provides sample data for each of these methods (and an interactive quiz to help users understand how to draw implications from data), and reports and presents data so they can be understood by others.

Bureau of Justice Assistance (BJA) Evaluation Web site (www.ojp.usdoj.gov/BJA/evaluation/). This Web site provides state staff members, criminal justice planners, researchers, evaluators, and local practitioners with a variety of resources for evaluating criminal justice programs. The site includes information on the following topics:
- evaluation logic models
- performance measures
- program monitoring
- data collection and analysis
- process and impact evaluations
- evaluation planning
- how to choose an evaluation team

Community Toolbox (http://ctb.ku.edu/index.jsp). This Web site was created and is maintained by the Work Group on Health Promotion and Community Development at the University of Kansas, in collaboration with AHEC/Community Partners in Amherst, Massachusetts. The toolbox includes practical guidance for the tasks necessary to promote community health and development. Each section, including the sections on evaluation and assessment, includes the following:

- a description of the task
- advantages of performing this task
- step-by-step guidelines
- examples
- checklists of points to review
- training materials

In addition to sections on evaluation and assessment, the toolbox contains sections on the following topics:

- leadership
- strategic planning
- grant writing
- other tasks and activities

Evaluation Center at Western Michigan University (www.wmich.edu/evalctr/index.html). This Web site provides a wide range of online evaluation resources, including the following:

- Evaluation checklists—a collection of refereed checklists for designing, budgeting, contracting, staffing, managing, and assessing evaluations of programs, personnel, and students; for collecting, analyzing, and reporting evaluation information; and for determining merit, worth, and significance

- Glossary resources, including glossaries of evaluation terms and links to other evaluation glossaries

- Evaluation bibliographies

- An international directory of evaluators that can be searched by country, State, region of the United States, name, and specialty

- Evaluation e-mail discussion lists

- Many useful publications, of which many are available for download at no cost

Publications Available Online
Framework for Program Evaluation in Public Health
(www.cdc.gov/mmwr/preview/mmwrhtml/rr4811a1.htm). "Morbidity and Mortality Weekly Reports," 48 (RR11). September 17, 1999.

This framework from the Centers for Disease Control (CDC)is a practical, nonprescriptive tool to summarize and organize essential elements of program evaluation. The framework comprises steps in program evaluation practice and standards for effective program evaluation. Adhering to the steps and standards of this framework will enable users to understand each program's context and will improve their ability to conceive and conduct program evaluations. Furthermore, the framework encourages an approach to evaluation that is integrated with routine program operations. The emphasis is on practical, ongoing evaluation strategies that involve all program stakeholders, not just evaluation experts. Understanding and applying the elements of this framework can help users plan effective public health strategies, improve existing programs, and demonstrate the results of resource investments.

Guide to Project Evaluation: A Participatory Approach
(http://www.phac-aspc.gc.ca/ncfv-cnivf/familyviolence/html/fvprojevaluation_e.html). Ottawa: Health Canada, 1996.

This guide provides an easy-to-use, comprehensive framework for project evaluation. The guide includes information on defining the key evaluation questions, delineating key evaluation steps, writing project goals and objectives, outlining success indicators, collecting and interpreting data, and using evaluation results.

W. K. Kellog Foundation Evaluation Toolkit (www.wkkf.org). This Web site contains several online publications about evaluation, including the following:
- W. K. Kellog Foundation Logic Model Development Guide
- W. K. Kellog Foundation Evaluation Handbook
- Fundación W. K. Kellogg Manual de Evaluación
- Guiding Program Direction With Logic Models
- Evaluation in Foundations: The Unrealized Potential

Program Manager's Guide to Evaluation
(www.acf.hhs.gov/programs/core/pubs_reports/prog_mgr.html). Washington, DC. Administration for Children and Families, U.S. Department of Health and Human Services, no date.

A basic guide to evaluation for program managers, this Web site discusses why and how programs should be evaluated, as well as how to report evaluation results.

User-Friendly Handbook for Mixed Method Evaluations
(www.ehr.nsf.gov/EHR/REC/pubs/NSF97-153/start.htm). Arlington, VA: National Science Foundation, 1997.

This handbook is based on the recognition that experienced evaluators have found that the best evaluation results are often achieved by using mixed-method evaluations, which combine quantitative and qualitative techniques. It contains a discussion of the differences between quantitative and qualitative evaluation methods and how the two can be used together to provide a comprehensive perspective on a program's success.

Writing@CSU Writing Guides: Empirical Research
(http://writing.colostate.edu/guides/index.cfm). This Web site provides a series of "online textbooks" created at the Writing Center at Colorado State University that provide detailed coverage of many issues relevant to evaluation and other types of quantitative and qualitative research. Publications in this series include the following:

- Reliability and Validity
- Generalizability and Transferability
- Introduction to Statistics
- Experimental Methods and Design
- Ethnography, Observational Research, and Narrative Inquiry
- Case Studies
- Survey Research
- Content Analysis
- Rhetoric and the Presentation of Research in English Studies