

VISIONARY EVALUATION

FOR A SUSTAINABLE, EQUITABLE FUTURE

Evaluation 2014 | October 15-18, 2014 | Denver, Colorado

Professional Development Workshops

#12

Evaluating and Improving

- Cost
- Cost-Effectiveness
- Cost-Benefit

handout: page l

Evaluating and Improving Cost, Cost-Effectiveness, and Cost-Benefit

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Tuesday, October 14, 2014, 9 AM to 4 PM

Level: Beginner

Evaluating the costs of programs is the missing link between doing a superficial evaluation and doing an evaluation that gets changes made and funding delivered. Evaluating the monetary outcomes of programs can help, too. Once you have measured costs and perhaps benefits, adding cost-effectiveness, cost-benefit, and a cost-utility analysis to your evaluation is just a few more steps.

There is a bit more to it than that-but this is where this skill-building workshop can really help! You will finish this workshop knowing what "cost studies" all too often are, and what cost-inclusive evaluation can and should be. You will see how evaluations that include resources used the program, plus resources generated by the program, can help programs flourish. In addition, you will understand the basic tools for conducting and using several forms of cost-inclusive evaluation in your program and in your decisions.

You will learn:

- What a "cost study" is and can be. More specifically, how to recognize, interpret, and use findings from basic analyses of cost, cost-effectiveness, cost-benefit, and cost-utility
- To design and conduct basic evaluations that include costs of programs as well as the monetary and other universal outcomes resulting from programs, including how to communicate findings from cost-inclusive evaluation in simple graphic as well as numeric modes
- To recognize and avoid or recover from pitfalls common in cost-inclusive evaluations, including political and ethical problems
- To anticipate, understand reasons for, and work with resistance to cost-inclusive evaluation

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Evaluating the costs of programs is the missing link between

- doing a superficial evaluation
- doing an evaluation that gets changes made and funding delivered

Evaluating the monetary <u>outcomes</u> of programs can help, too.

learning objectives

- what a "cost study" is ... and can be
 - cost analyses
 - cost-effectiveness analysis
 - cost-benefit analysis
- evaluate costs, monetary & other outcomes
- present findings with graphs, numbers, words
- pitfalls common in cost-inclusive evaluation
- resistance to cost-inclusive evaluation

• Prerequisites: None

• Level: <u>Beginner</u>

your workshop leader Brian Yates, Ph.D.

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To help all learn better ...

- Silence phone tablet computer
- Save questions for end of unit
- Converse outside room

5 minutes for Q&A after each of 6 units

workshop schedule: 6 units 15-minute breaks at 10:30 AM and 2:30 PM

9:00	1. overview of cost-inclusive evaluation
9:45	2. evaluating costs
11:00	3. evaluating benefits & other outcomes
12:00	lunch on own
1:00	4. combining cost and outcome info
2:00	5. evaluating more than costs & outcomes
3:15	6. pitfalls & resistance
3:50	workshop evaluation

Why do cost-inclusive evaluation?



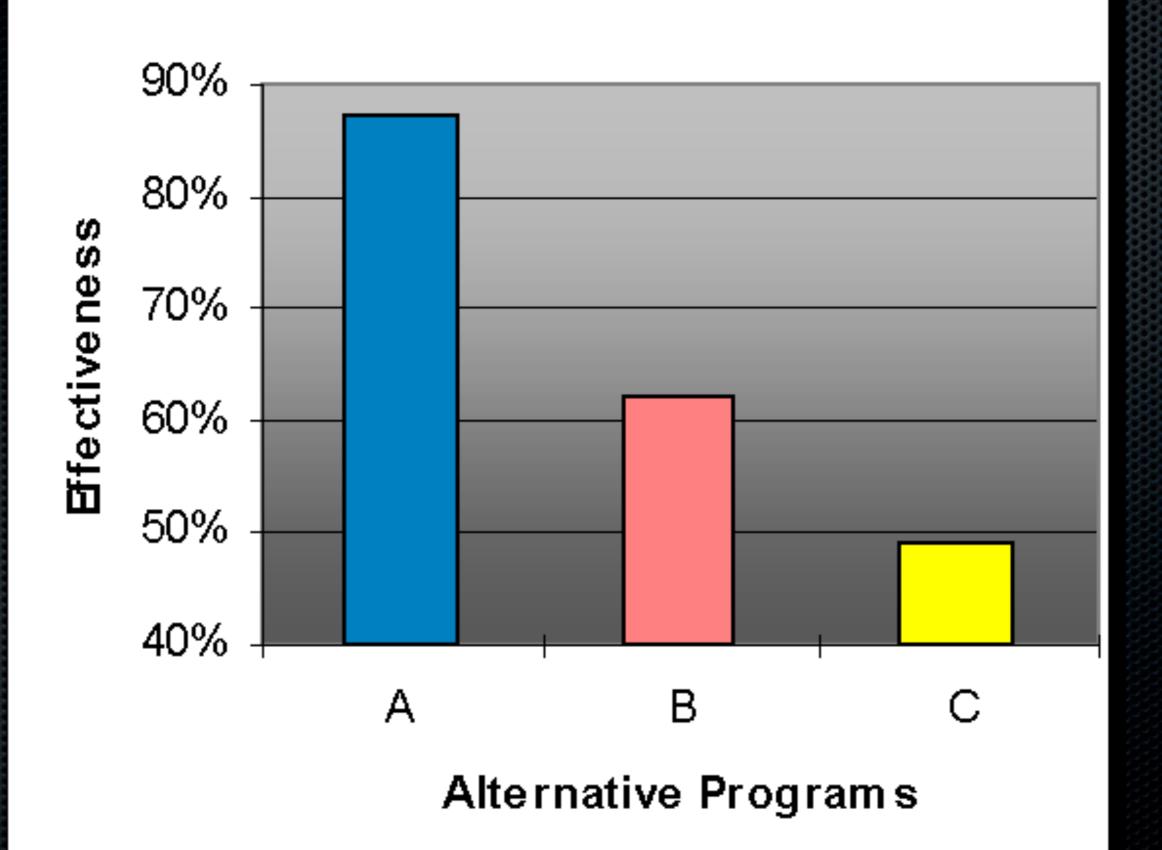
Because it asks insight-generating questions... for example:

- Are human services...
 - entrepreneurial efforts?
 - entitlements?
 - to the client?
 - to the provider of the service?
- What is the primary determinant of the costs and outcomes of our services?
 - techniques and technologies?
 - delivery system?

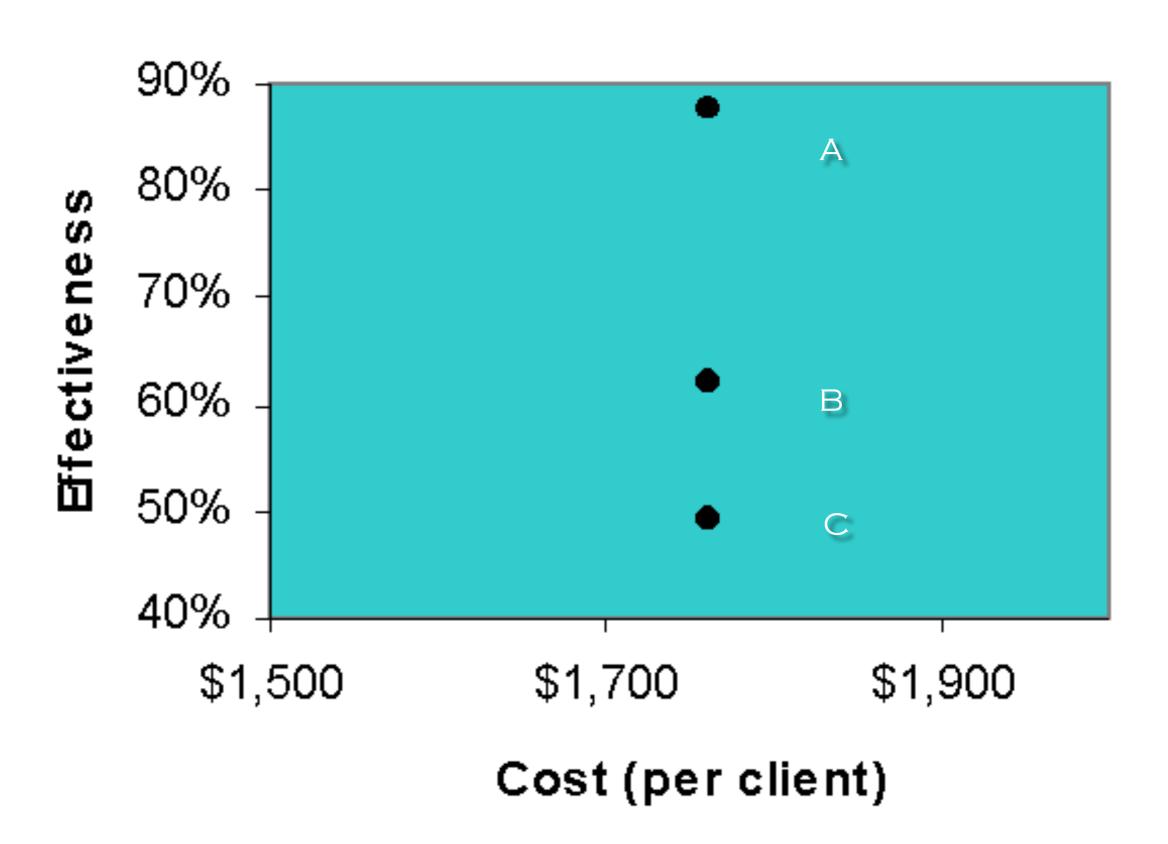
- Does the program work and
 - ... how much does it cost?
 - ... is it worth it?
- What's the difference between "cost" and "price?"
- Should decision-makers ...
 - ... maximize outcomes within resource constraints?
 - ... minimize resources needed to attain outcomes?

3 evaluators walk into a room ...

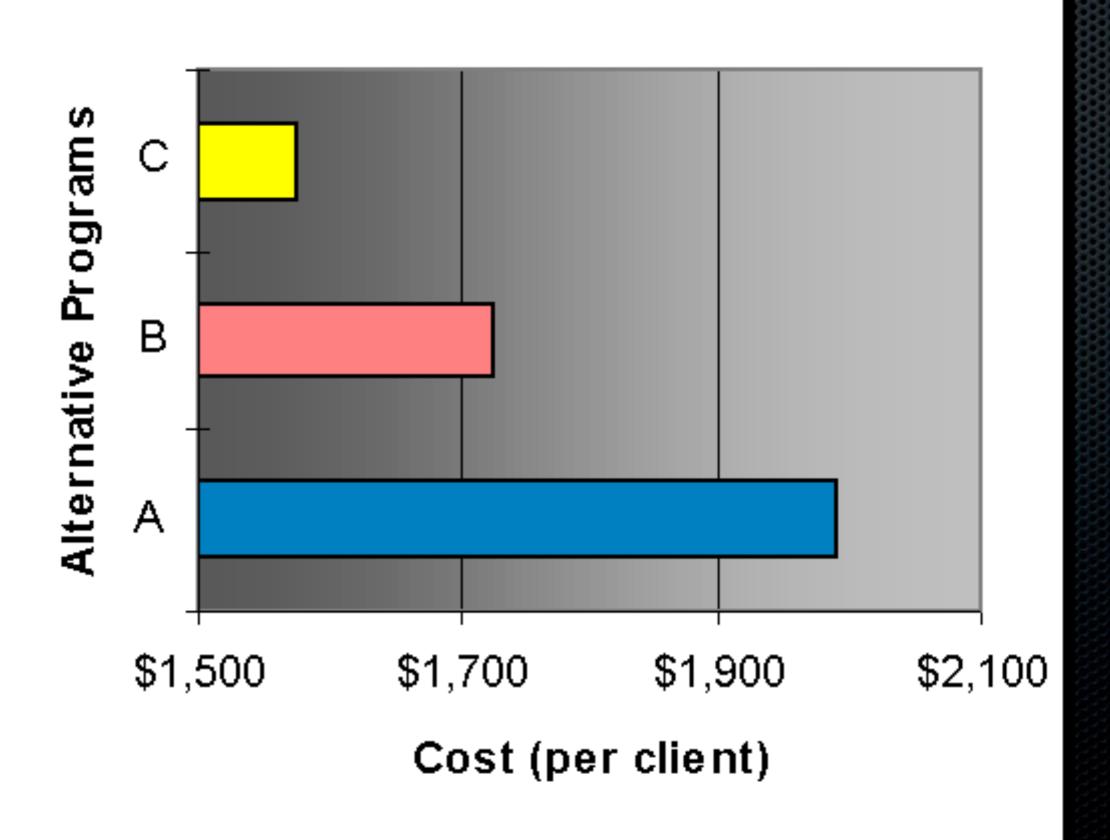
Program Effectiveness



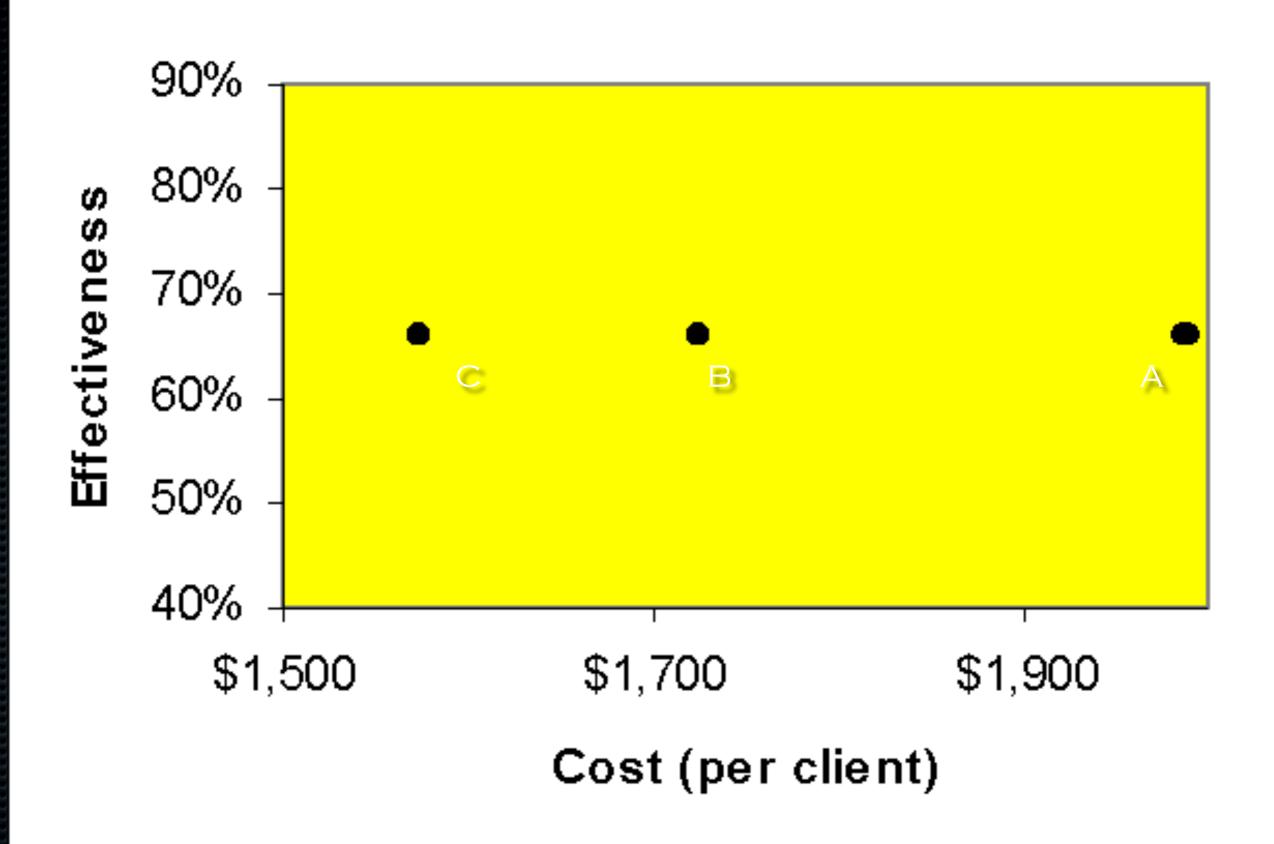
Effectiveness, Ignoring Cost



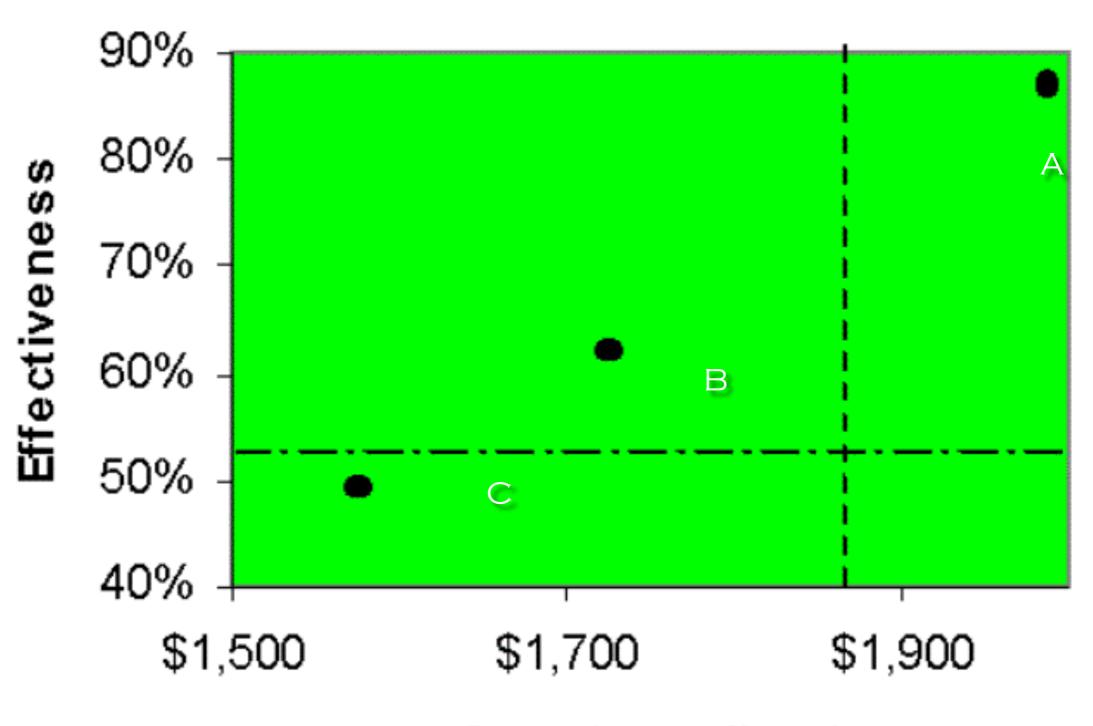
Program Cost



Cost, Ignoring Effectiveness



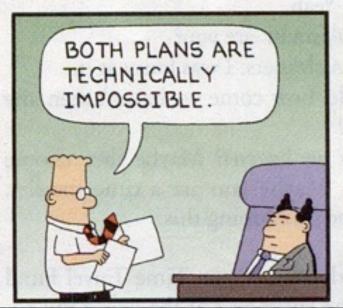
Cost-Effectiveness for Alternative Programs



Cost (per client)

Sometimes Costs are all that Matters...

Dilbert By Scott Adams





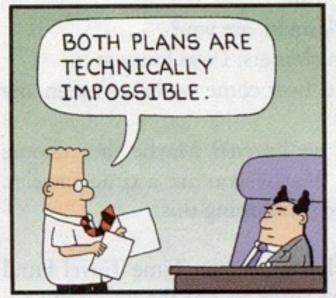




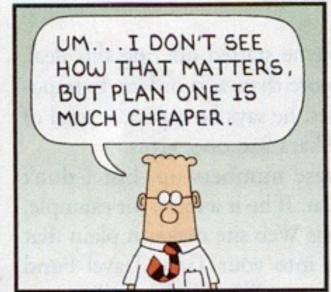
Sometimes even Costs don't matter!

Dilbert

By Scott Adams

















What is a cost study?

types of cost studies

- cost only
 - program cost ... cost per client per visit
- outcomes (monetary) only
- cost → outcome
 - cost → benefit
 - cost → effectiveness, cost → utility
- resource → activity → process → outcome

modeling the program

RESOURCES (examples)

- staff time and expertise
- space
- assessment instruments
- client time
- transportation
- medication
- iDevices
- ... & so much more!

ACTIVITIES

(examples)

- intake
- assessment
- diagnosis
- assignment to team
- social skills
- ongoing assessment
- relapse prevention
- transition to selfmanagement

PROCESSES

(examples)

- heightened client expectation of success
- acquisition of social skills
- acquire relapse prevention skills
- acquire selfmanagement skills

OUTCOMES

(examples)

- improved functioning
- less drug use
- more income
- more productivity
- less use of health services
- less use of criminal justice services

definitions...



handout pages 2-3

Evaluating and Improving Cost, Cost-Effectiveness, and Cost-Benefit

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Brian's Basics

It might help to start with some definitions and examples, so we're speaking more similar languages.

Definitions & Examples

Program: An effort to help people do better than they otherwise would. All programs have costs and out-

comes. Examples: HeadStart, therapy, AA, smoking prevention, drug abuse prevention.

Costs: The value of what it takes to make the program happen. Time of skilled providers, space for meet-

ings, communications services like phones and computers, liability insurance, administration (including accounting and human resources). The amount of money actually spent to assemble providers, space, and other resources is usually called the cost of the program. This may not include valuable resources such as volunteers' time, space rented at below-market values, and do-

nated food, transportation, and equipment.

Outcomes: What the program is trying to accomplish for their clients, for the community, and for the program's

funders. Outcomes can be measured in monetary units, and can be monetary, but need not be. *Examples*: reduce bullying and assaults, get jobs, improve income, reduce unnecessary Emergency Room visits, cut down on unnecessary use of hospital and doctor services, reduce crime, arrests,

and days in jail.

Effectiveness: Outcomes that aren't money and that aren't converted into money or measured with monetary

units. Examples: reduce bullying and assaults, reduce Emergency Room visits.

Benefits: Outcomes that are money. Examples: improved income, savings in health care expenses due to

reduced Emergency Room visits, savings in income support payments no longer needed due to

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employment, savings in criminal justice costs due to less crime, fewer arrests, and less jail time. Assessment: Measuring something that's of possible importance. Examples: People can be assessed for their health, their mental health, their intoxication, their mechanical skills, and what they know. Programs can be assessed for how well they accomplish their goals – for example, how many clients achieve the desired outcomes.

For programs, assessment asks what the program does compared to no program, and compared to other programs already in place. It's possible that a well-intentioned program doesn't help people do better than they already are doing, either because of another program already in place or because the people are getting better on their own.

Some programs even hurt people, even though the program was designed to help and seems like it should help. Without assessment of a program, you just don't know. Example: HeadStart evaluations.

Cost-Effectiveness: A type of program assessment that asks, "What does this program accomplish relative to its cost?"

Examples: cost per drug-free day, cost per child prevented from smoking, cost per year of life

saved, cost per quality-adjusted life year.

Cost-Benefit: A type of program assessment that asks, "Is the cost of this program justified in terms of the value

of its outcomes?" Examples: ratio of dollars spent for therapy versus dollars saved in reduced unnecessary use of health services, net benefit (after subtracting costs) of diversion program for

homeless adults (in terms of reduced use of Emergency Room and jail).

Cost-Utility: Program assessment that asks, "What is the cost of producing an improvement in an outcome that

is defined similarly for all programs being compared or to which the program may be compared – an outcome that is not monetary or monetized but a common accepted measure of program re-

sults. Examples: \$ per Quality-Adjusted Life Year (QALY) gained.

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Program

An effort to help people do better than they otherwise would.

All programs have costs and outcomes.

Examples:

- HeadStart
- clinics
- community mental health centers
- AA
- smoking cessation intervention
- drug abuse prevention media campaign

Effectiveness

Outcomes that aren't money Examples:

- reduced bullying and assaults
- reduced Emergency Room visits
- increased employment (but not earnings)
- enhanced health

Benefits

Outcomes that are money

... or can be monetized

Examples:

- improved income
- savings in <u>health</u> care expenses
 - example: due to reduced Emergency Room visits
- savings in income assistance payments
 - example: no longer needed due to employment
- savings in <u>criminal</u> justice costs
 - example: due to less crime, fewer arrests, and less jail time.

Costs

The value of what it takes to make the program happen

Examples:

- time, energy, effort of skilled providers
- space for meetings
- communications services like phones and computers
- liability insurance
- administration (including accounting and human resources)

Costs (continued)

- Money spent to assemble providers, space, and other resources often is called the "cost"
- This "cost" usually excludes critical resources such as:
 - volunteers' time
 - interns' (and externs') time
 - under-paid staff member's time
 - space rented at below-market values
 - donated food, transportation, and equipment

Costs (continued)

Costs sometimes are reported as:

- cost per client
- cost per "slot" ... per "bed"
- cost per client day
- cost per group

Cost-Effectiveness

"What does this program accomplish relative to its costs?" Examples:

- cost per drug-free day
- cost per child prevented from smoking
- cost per year of life saved
- cost per quality-adjusted life year (\$/QALY)
 the last is called Cost-Utility Analysis

Cost-Benefit

"Is the cost of this program justified in terms of the value of its outcomes?"

Examples:

- ratio of dollars spent for therapy versus dollars saved in reduced unnecessary use of health services
- net benefit (after subtracting costs) of diversion program for homeless adults (in terms of reduced use of Emergency Room and jail)

tools

needed for costinclusive evaluation

... measure

- resources <u>used</u> (aka "costs")
- resources <u>produced</u> (aka "benefits")

by a program by programs

Qualitative tools...

- multiple perspectives
- costs are not always money
- outcomes can be money
- understand that neither outcomes nor costs may be what's most important

Quantitative tools...

- spreadsheet functions: inflation, present-value
- statistics
 - nonparametric analyses
 - parametric analyses

for large-scale quant & qual evaluation:

database access to:

- health service
- criminal justice
- income assistance
- other entitlements

- To do CIE (cost-inclusive evaluation): awareness of pitfalls and resistance
 - ... to evaluation in general
 - ... to cost-inclusive evaluation in particular
- deal-with-able, if not solvable perhaps: resistance « importance

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Whys of cost-inclusive evaluation (write \rightarrow pass to right \rightarrow read \rightarrow react)

why it's asked for more and more	why cost-inclusive evaluation is necessary
why we do it all the time anyway, if not so thoroughly	why some programs, and individuals, resist cost-inclusive evaluation

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questions, answers