

# COST BENEFIT ANALYSIS

## Solutions



### Cost benefit analysis

Understanding the impact of your project in terms of costs and benefits can guide decision-making about which of your solutions to progress. Your analysis should provide a compelling case for investment and be based on both clinical effectiveness and value for money and for patients.

### Solutions

The purpose of this phase is to develop and agree on solutions to your identified problems. Solutions are generated, designed, prioritised and then tested with key stakeholders, to make sure they are effective.

## Key points

### 1. Identify one-time costs

Identify the costs that will be required in your solution as a once off. Costs such as wages for project staff, travel and communications should be listed. Although these costs are not long-term they will be required throughout the project duration. Anticipate implementation costs associated with acquisitions (equipment, venue hire) and implementation (training, developing IT system, staff time) for the full period of the project.

### 2. Identify recurring costs

Ongoing costs for running and maintaining the change once it is business as usual may include staffing costs, rent, equipment and maintenance. If your solution requires a long-term investment then be clear on how this impacts on budget over time. These costs need to be balanced with benefits. While costs are nearly always expressed in dollars, benefits can be monetary, efficiency or experience and outcome measures.

### 3. Identify benefits

Benefits usually refer to anything that improves the use of resources and the patient experience of care. Consider how your solution may do the same with less input (staff, equipment, time) or do more with the same (improve throughput or decrease length of stay). Include benefits to organisation and service (KPIs, productivity, waste), health outcomes (impact of disease, self-management) or benefits such as staff satisfaction, patient experience and safety.

### 4. Quantify costs and benefits

Combine costs and benefits into a simple measure of total benefits as a proportion of total costs. Your local finance staff may be able to help you to quantify benefits. A cost:benefit ratio (CBR) greater than one implies that total benefits of a program outweigh the costs and can provide a strong basis to approve it. This will be important to support the worth and value of your project and chosen solutions.

## Considerations and tips

Resources in health are precious and in high demand. This is all the more reason to provide a clear and accurate cost benefit analysis for your stakeholders to prove the value in your solutions.

### SMART benefits

Align your benefits with your project objectives. Outline each benefit using the SMART framework to assess if it is specific, measurable, achievable, relevant and timely. Your stakeholders need to understand exactly how your benefits will be measured to see the value in your project or solutions.

### Business case

If your solution requires funding, you may need to prepare a business case. As well as including the case for change, a business case provides a detailed analysis and explanation of the expected costs and benefits of each proposed solution and the impact of the 'do nothing' scenario.

### Think lean

Consider the lean methodology in helping you identify the benefits and how you are eliminating waste of resources that are not creating value for the consumer. The seven wastes in lean are: motion, transport, inventory, overproduction, over-processing, defects and waiting.

### Measure value

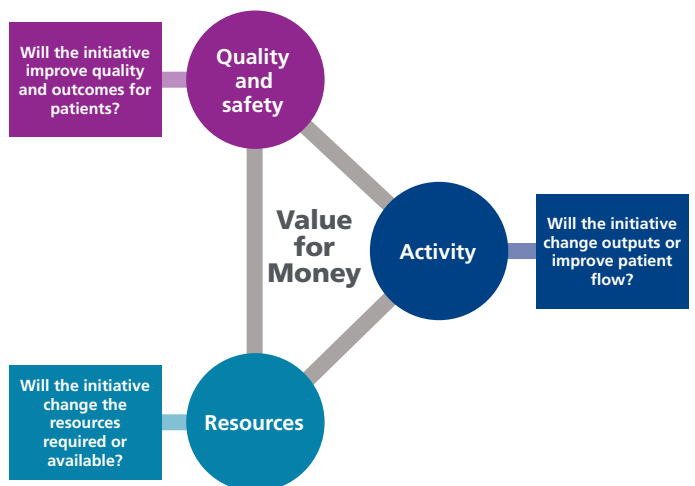
Avoid vague descriptions of benefits like 'improve' or 'maximise'. Instead, keep the measures clear and as tangible. If it's not possible to have a direct numerical measure, use satisfaction scales, such as a decrease in complaints. Highlight the value to the consumer as often as you can.

## Cost benefit ratio

$$\text{CBR} = \frac{\text{Total Benefits \$}}{\text{Total Costs \$}}$$

## Benefits

A REAL BENEFIT requires an improvement in at least one of these areas without impacting negatively on the others.



## Further information

[My Health Learning Log in Form](#) – Redesign Solution Design (202465315): Cost Benefit Analysis

## Next steps

A good cost benefit analysis will help you further prioritise the solutions to take forward. You will then need to develop a statement that summarises each solution in terms of design, feasibility, benefits and costs. This will help stakeholders to understand your proposed solutions design in detail.