Conducting a Risk Analysis

What is a risk analysis?


There are two steps in conducting a risk analysis:

1. Determining factors that may impact your project
2. Assessing the likelihood that identified factors will occur

Instructional designers familiar with the ADDIE model will recognize risk analysis as part of the ANALYSIS phase.

Why do a risk analysis?

A proposal that includes risk analysis can make a project seem feasible to project members and stakeholders. By thinking about risk factors that could impact your project at the beginning, you can manage the project more effectively by:

- reducing the potential for unexpected problems
- making informed decisions about which risks to mitigate from the outset
- developing a comprehensive risk management plan

How do I do a risk analysis?

1. Determine factors that may impact your project

If you have a solid project plan and completed your ANALYSIS phase, then risk analysis will be easier because you have already identified potential risks. To do risk analysis, reflect on:

- your experience with the client
- what you know about the project background
- your experience with similar projects

If you are not familiar with the client and/or project, you should:

- review records of similar projects done in the past, especially project evaluations
- talk to colleagues and experts familiar with similar projects
- talk to colleagues that have worked on projects with your client

Doing this may help you identify risk factors specific to your project.

Next, you should create a list of risk factors. Consider internal and external risk factors (Table 1). Every project is different and therefore it is impossible to provide a compressive list of risk factors to consider.

References


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2. Assess the likelihood that identified factors will occur

There are different ways to assess risk (see box to the right). The one you choose depends on your risks and client audience. Table 2 is an example of how you might assess risk using category ranking.

<table>
<thead>
<tr>
<th>Risk</th>
<th>Probability of occurrence</th>
<th>Risk Severity</th>
<th>Risk Analysis</th>
</tr>
</thead>
<tbody>
<tr>
<td>Describe risks</td>
<td>How likely is it to occur (high, medium, low)</td>
<td>How severe are the consequences? (high, medium, low)</td>
<td>Final analysis: (probability, severity)</td>
</tr>
<tr>
<td>1. Aggressive timeline</td>
<td>high</td>
<td>high</td>
<td>(high, high)</td>
</tr>
<tr>
<td>2. Access to SMEs</td>
<td>low</td>
<td>medium</td>
<td>(low, medium)</td>
</tr>
</tbody>
</table>

Adapted from: http://www.sticky minds.com/s.asp?F=S3061_COL_2

When determining risk severity, consider the impact of a risk on:
- the total project, rather than just a part of it (i.e. look at the critical path)
- related risks (when assessing their impact on the overall project)
- project team morale, product quality, etc.

In Table 2, the first example illustrates that if an aggressive timeline is very likely to happen, then other project resources will be impacted which means you may go over budget. Example 2 illustrates that there is a low probability that you will not have access to SMEs, yet it would impact your project with some severity (medium) because your product relies on their input. When sharing risks with your client focus on ones that they can control and/or change, especially if they severely impact your project.

What’s Next?
You are ready to create a risk management plan. Decide if you will avoid, mitigate or accept any of the identified risks. If you choose to avoid or mitigate the risk, your plan should include a description of how you will do so. Be sure to specifically describe risks and their associated consequences (Portny, 2004, p.267). For example, “if x happens, then the timeline will be delayed by y weeks.”