

Informatics Project Proposal: Tutorial 5: Planning your MSc project

INFR11137: Informatics Project Proposal

Check list of this tutorial

- 1. Elevator pitch (10 mins)
- 2. Project management tools (10 mins)
- 3. Tasks, dependencies, milestones, and deliverables (5 mins)
- 4. Activity (25 mins)

Elevator Pitch - Pairs (5mins)

• In this tutorial, the 'pitch' requires you to present the aims, objectives and constraints of your research (60 s)

Think about:

Aims: what you want to achieve with the project, e.g.:

• creating an application/making a robot/reviewing literature systematically/...

Objectives: what actions necessary to achieve an aim, for the "application" example:

- designing a GUI
- finding reputable guidelines for how to design a GUI
- ...

Project Management Tools

Here are two tools that may help you with the research topic and constraints:

- Mind Maps
- Drill Down

Choose one of them to manage your project.

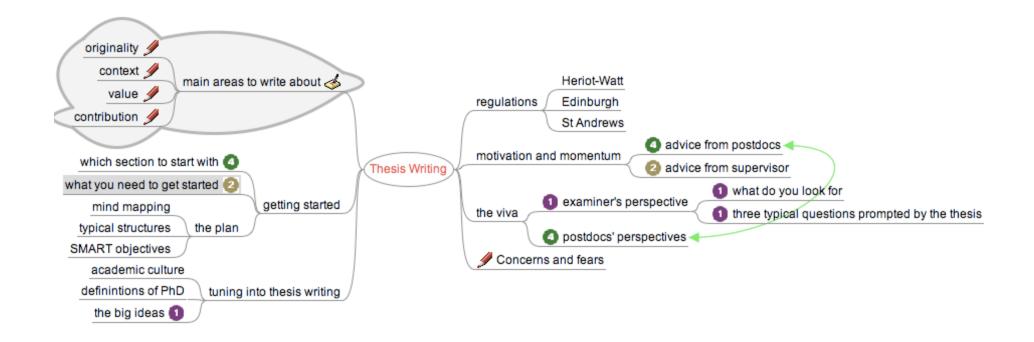
Mind Maps (5mins)

- Useful at the earliest stages of a project
- Helps set out different possibilities for tackling your project
- Makes linkages more obvious
- Online mind map tool:

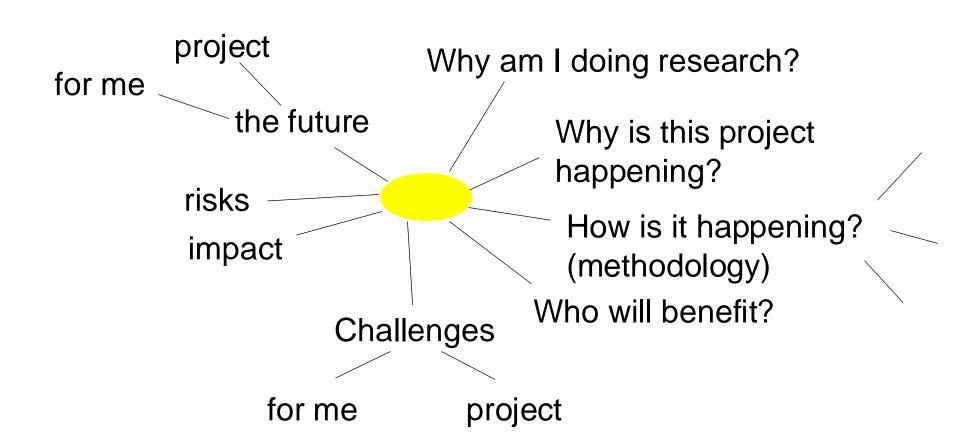
https://www.mindtools.com/pages/article/newISS 01.htm

Mind Map Example

- Use single words or short phrases
- Use colors to separate ideas
- Use symbols/images if helpful



Mind Map 'Template'



Drill Down (5mins)

 This technique may help you identify different tasks that are needed to complete your project

Start by thinking about the problem that your project addresses

- Break the problem down into smaller tasks/action points and potential questions
 - repeat this, until they become really small steps that you know you can (or will be able to) complete

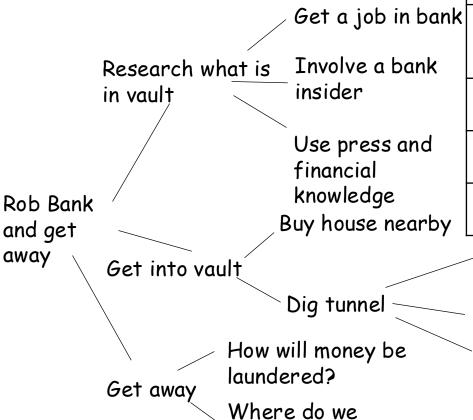
Drill Down Example

• Example: 'Record' bank robbery in Brazil

Thieves in Brazil have stolen up to \$65m (£36m) after tunnelling into a bank in what police say could be the biggest bank robbery in Brazil's history.

- •The thieves dug a 200m (656ft) tunnel into the bank from a nearby house in the northern city of Fortaleza.
- •Neighbours said between six and 10 men worked at the house, rented in the name of a company making artificial turf.
- •The theft happened over the weekend but was not discovered until Monday morning because the bank was closed.
- •Neighbours reported seeing vanloads of material being removed each day.

"It's something you see in the movies... They dug a tunnel that goes underneath two [city] blocks. They've been digging for three months," investigator Francisco Queiroga told the Reuters news agency.



hide?

Risk: Will the cash be identifiable?

Resource: Where will we buy construction equipment?

Dependencies: Buy the house before

Milestone: money laundering plan

Deliverables: a tunnel to the bank

Set up business to hide soil removal

Get plans of building
Buy construction

equipment

Tasks, dependencies, milestones, and deliverables (5 mins)

- Tasks essential pieces of work that need to be completed.
- **Dependencies** relationships between tasks based on their sequence.

 Dependent tasks require one or more other tasks to be completed or started before the team can start work on them.
- Milestones checkpoints throughout the life of the project. They identify when one or multiple groups of activities have been completed thus implying that a notable point has been reached in the project.
- **Deliverables** measurable and tangible outcomes of the project. They are developed by project team members in alignment with the goals of the project.

Activity (15mins)

Use either mind map or drill down for your project to identify:

- some of the tasks/actions that you need to take to solve your research problem
- one milestone
- two deliverables

Activity (10mins)

- Present your Mind Map/Drill Down draft to a classmate.
- Discuss your colleagues' findings (tasks, milestones, deliverables)

Q&A

 Ask questions if you need to clarify aspects related to project management