Using worst case scenarios
Case Study 1
Background information

- LPG storage and distribution
- 950 tonnes of LPG
  - 7 tanks x 100 tonnes
  - 1 tank x 250 tonnes
- LPG spheres – ground storage
- 15 ~ 25 meters distance between tanks
- 500 meters from the border
Questions

- What do you consider worst case scenario
  - (low probability-high consequences outcomes with the maximum negative consequences)
- What is the quantity of LPG involved
- Do you consider it definitely incapable of transboundary accident
Modeling results

- Standard distances table ~ 1200 m
- RMP*Comp – ~1300 m
- ALOHA – ~ 900 m
Developing worst case scenario

- Select a scenario
  - release of the largest amount in a single largest vessel – 200 tonnes
  - Take into account possible domino effects
- Determine the distance to the endpoint
  - Using standard distances table
  - Using modelling software
    - Aloha
    - RMP Comp
    - Spreadsheet models
- Determine transboundary potential
  - 500 meters from the border
  - There will be consequences across the border

The establishment is a hazardous activity