



Ministerie van Sociale Zaken en
Werkgelegenheid

Thermphos

How to deal
with a bankrupt
Seveso site



History of Thermphos

- The site was built in the 1968 by Hoechst AG
- Production of Phosphor, DMT (Trevira), Alkanesulfonate en TAED
- There is radioactive material present and therefore a special permit is needed beside the environmental permit
- Around 400 people were employed there
- Until 2012 Thermphos was the only phosphor producer in Europa
- In 1997 due to a reorganisation the phosphor division become an independent company Thermphos
- In 2000 Thermphos was bought by the direction through a management buy-out



Thermphos in 2010





Ownership issues

- In 2003 it was bought by a Italian/Israeli/Kazachstan businessman Nahum Galmor.
- In 2004 the Dutch prosecution office concluded that the factory was bought with money from a Russian weapons dealer.
- The police start an investigation as did the Israeli police.
- In 2010 a Dutch minister concluded there is no evidence for a further investigation
- In 2012 a Israeli judge convicted the owner and the weapon dealer for fraud regarding the purchase of Thermphos.



Results bankruptcy Thermphos

- In 2012 bankruptcy was filled mainly due to overproduction of Phosphor in Kazakhstan, highly increased electricity and raw material prices and increased environmental demands.
- A curator was appointed in 2012 which tried to achieve a restart in 2013 and eventually sold of parts of the company. The Phosphor factory would be dismantled and the land would be sold for reuse
- In 2014 the clean up of the terrain started.
- The costs for clean-up are now estimated on €87.5 million.



Results bankruptcy Thermphos

- The extreme costs and slow progress on the clean-up caused administrative and political problems
- A commission was asked to resolve these problems especially the financial part
- The clean-up caused also legislative problems
- The site was an upper tier site from the beginning just alone due to the amount of phosphor
- After closure this site remained an upper tier site also due to the amount of phosphor (sludge)



Clean-up Thermphos

- A clean-up plan was made (part of the new permit to dismantle the site)
- Main focus for the clean-up is on phosphor sludge, asbestos and radioactive material
- A special installation was built to process the 340 tons of phosphor sludge
- Part of the site (f.i. heating of the sludge, keeping it under water etc.) is still in use
- The costs for operating the closed site are €700.000,- per month. (50% is energy costs, the rest operators, security, fire brigade etc.)



Clean-up Thermphos

- Disposal of the Phosphor takes another 6-12 months, and further dismantling another 2,5 years
- The phosphor sludge is preprocessed in a filter press to separate the phosphor
- This is followed by burning the phosphor in a calciner (combustion oven)
- Difficulty is that a part of the phosphor sludge is impenetrable and has different composition due to the shut-down right after the bankruptcy
- New technology for the processing of this sludge is needed
- On the terrain also 110 ton phosphor sludge from a former factory in France was present



Clean-up Thermphos

- The clean-up has 2 phases
- The local authorities tries to remove the Seveso status after phase 1
- The environmental permit was from 1993/1994 with several additions
- After many meetings the inspections and government parties decided to not update the safety report
- Several shutdown of the activities because of health and safety issues for the workers