

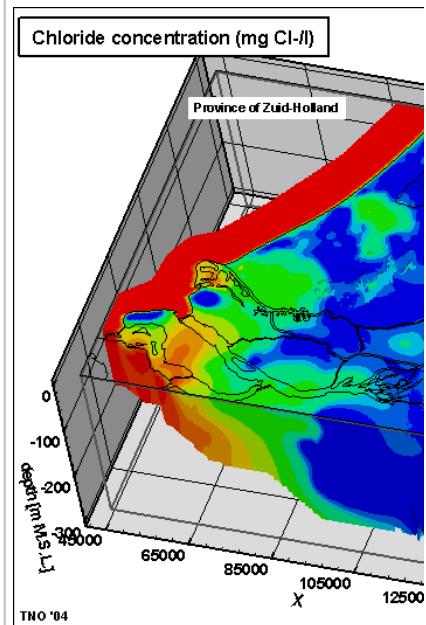
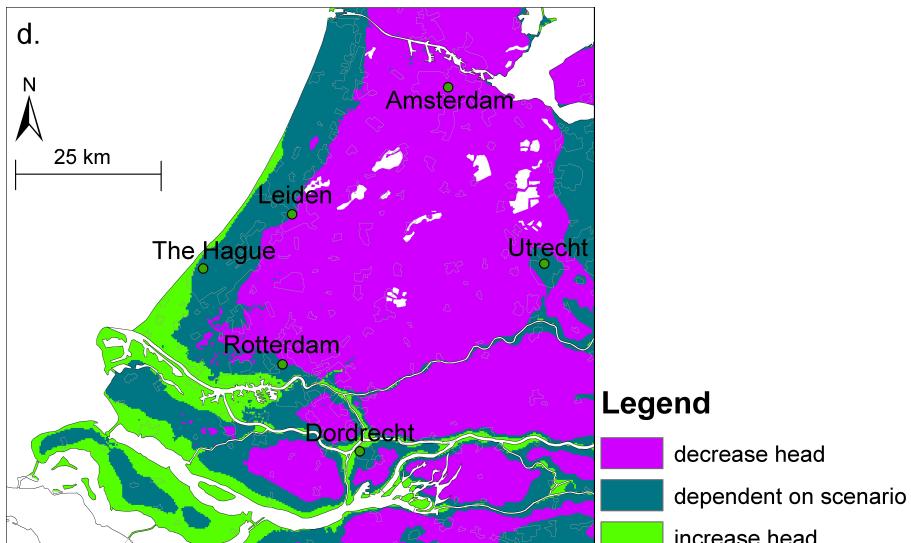
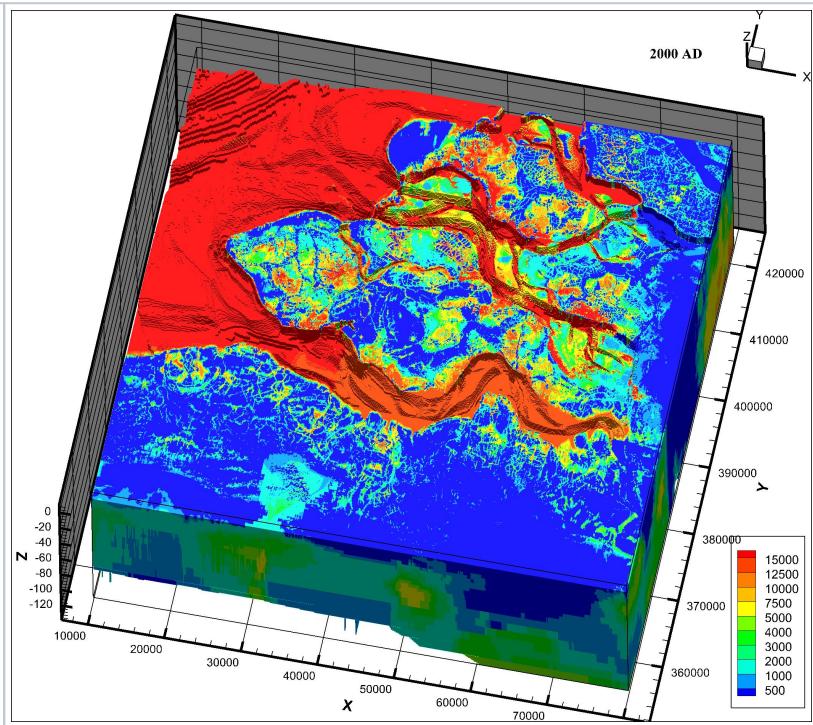
Regional

Research on salinisation processes in the Province of Zeeland

The fresh water resources in the groundwater system of the coastal province of Zeeland are at present jeopardized by various causes. Floods, droughts, eutrophication and salinisation of the ground and surface waters are some pressing topics. Moreover, sea level rise and climate change threaten the groundwater system even more. Water management in the province should anticipate on these changes. The province has initiated a study to get a better insight in the salinisation processes in the top system. The main goal is to analyse what measurements are effective in mitigating the salinisation of the water system. Special attention is given to the so-called rainwater lenses in agriculture plots. Agricultural crops depend on these shallow vulnerable water systems which float upon brackish groundwater and vary over the season in thickness.

Poster Sal Water Intrusion Meeting 2010 (Engels): [poster](#)

Poster Deltas in Times of Climate Change 2010 (Engels): [poster](#)



Large parts of the Province Zuid-Holland, the Netherlands, are situated several metres below mean sea level. Saline groundwater from the North Sea and from marine fine-grained sand deposits are found near the coast.

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ion, future seems a little riser and subsidence are expected to jeopardise the ground water system even more. Water management agencies are concerned about the future stability of this dynamic ground water

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lead to an acceleration at ed inf lo w of sa lin e gr ou nd w at er to w ar ds th e co as tal gr ou nd w at er sy st e m in th e ne xt ce nt ur i es .

Article: Oude Essink, G.H.P., E.S. van Baaren, and P.G.B. De Louw 2010, Effects of climate change on coastal groundwater systems: A modeling study in the Netherlands, *Water Resour. Res.*, 46, W00F04, doi:10.1029/2009WR008719

Presentation: Oude Essink G.H.P, Van Baaren E.S., De Louw P.G.B., 2010, Effects climate change on coastal groundwater systems, focus on the Rhine Delta, *Proceedings Deltas in Times of Climate Change*, Rotterdam, The Netherlands, Sept-Oct. 2010 |