









SCIENCE AND POLICY INTEGRATION

FOR COASTAL SYSTEM ASSESSMENT

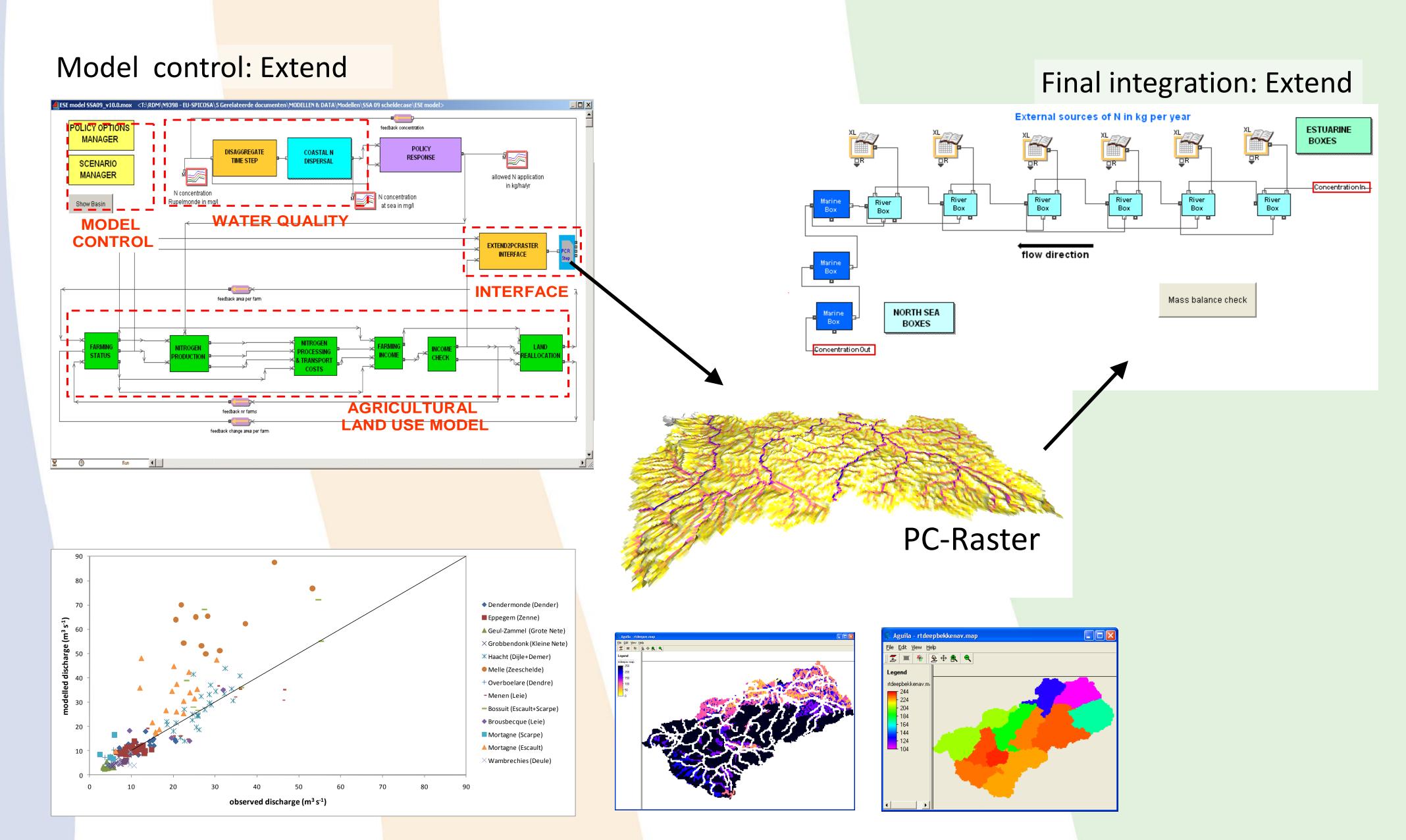
Nitrogen source apportionment for the catchment, estuary and adjacent coastal waters of the Scheldt - SSA 9

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Calibration: measured and modelled flow at different stations across the basin; deviations from 1:1 are explained well by diversion in canals near French-Flemish border and Ghent.

The policy issue: trans-boundary Nitrogen source apportionment

- Decided after institutional stakeholder consultation;
- inspired by WFD-needs

Extend-PC-Raster model innovation

- Farmers decision-making (approximately agent-based),
- SRES- and climate scenarios,
- Flexibility in incorporating policy measures (such as buffer strips)
- Land use + hydrology + estuary + coastal sea
- Interfacing with PC-Raster

Stakeholder responses

French and Flemish agencies quite interested

Unforeseen outcomes: too early to tell

Critical evaluation for ICZM: focus on N is too limited

Uniqueness of solution

 transboundary apportionment can be modelled quite flexibly and with considerable spatial resolution





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