



Chesapeake Bay Program
Science. Restoration. Partnership.

Future Model Updates

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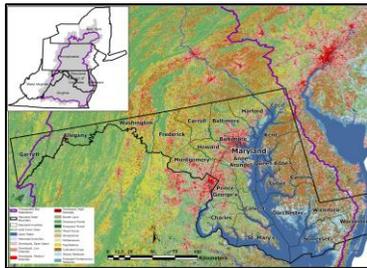
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Water Quality Goal Implementation Team

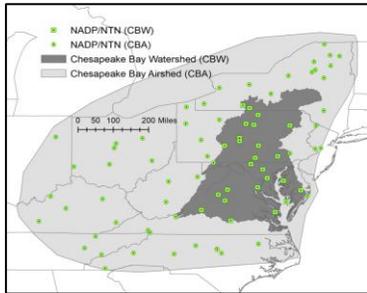
Model Phase Change

Data and Model Inputs

BMP Data
Land Use Data
Point Sources Data
Septic Data
U.S. Census Data
Agricultural Data



Land Use Change Model

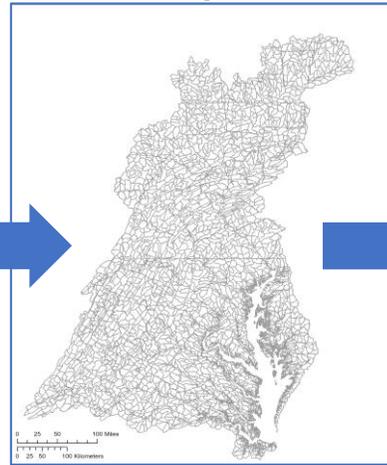


Airshed Model

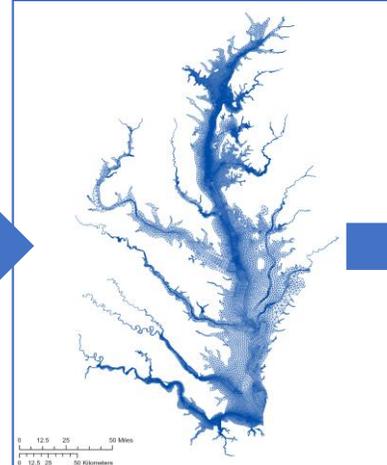
Precipitation Data
Meteorological Data
Elevation Data
Soil Data

Nutrient and sediment targets for CBP state and Federal partnership

Phase 7 Watershed Model/CAST



Estuary Model

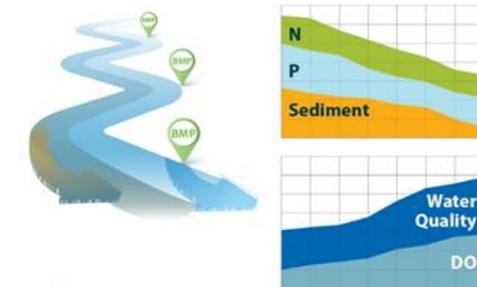


Model Outputs

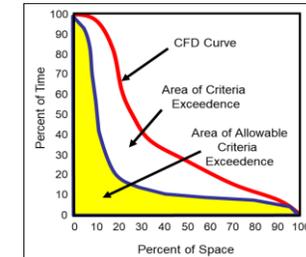
Prediction of Impacts



BMP Implementation Results



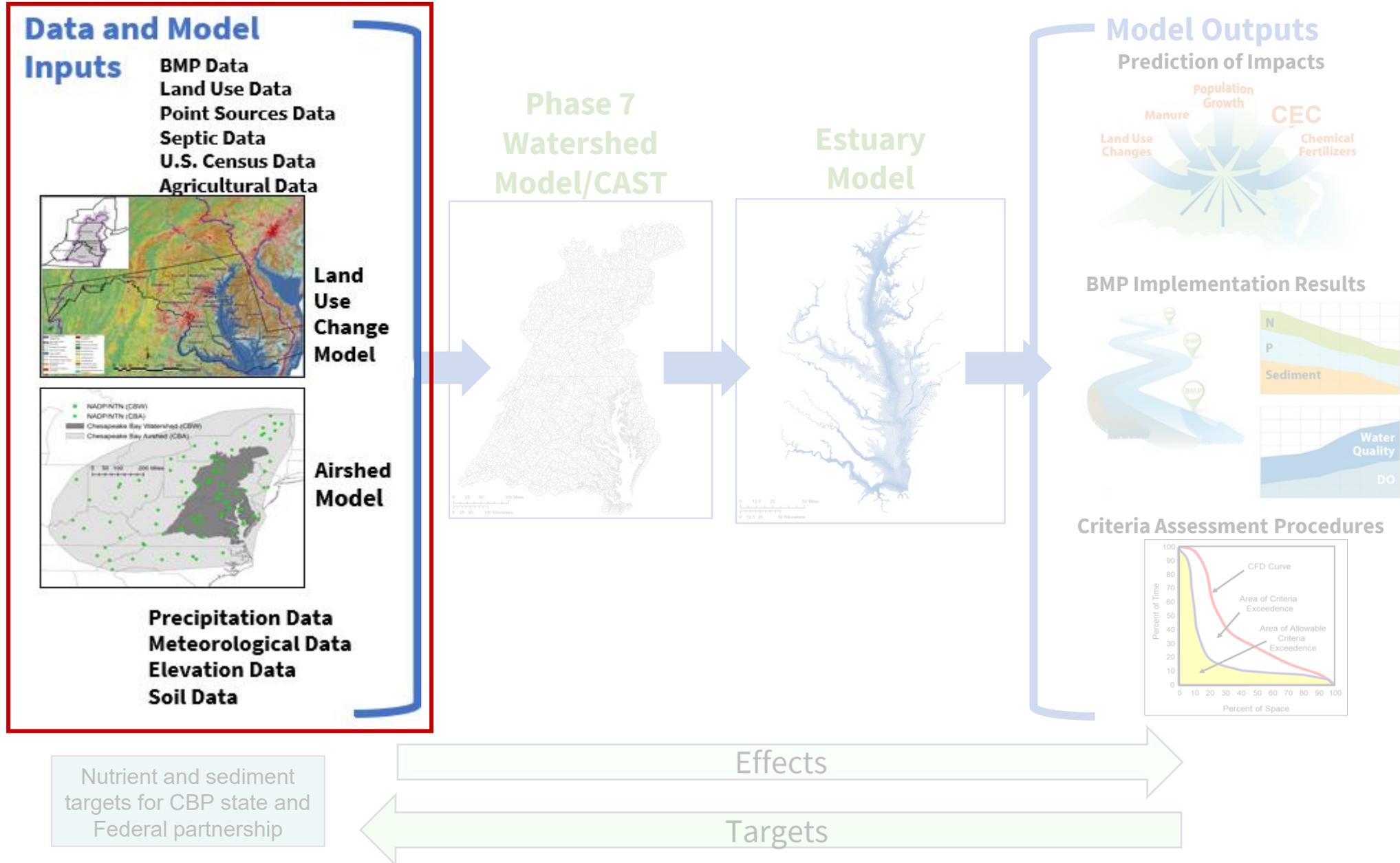
Criteria Assessment Procedures



Effects

Targets

Version Change



Data Considerations – This is Draft

Data and planning horizons

- Phase 7 – model complete and in use 2028
- Planning targets – Completed in 2029
- WIPs – Phase 4 or updated Phase 3 – should be completed by middle of 2030
- Transition to P7 – 2030 – 2030 annual progress utilizing P7 suite of tools.
- Milestones – currently a 2-year cycle unless we change it
- High-Res Land Use – Currently created/curated every 4-5 years. (updates 2029/2034)
- Ag Census – Created every 5 years by USDA (updates 2022, 2027, 2032)
- New BMPs – when can they be incorporated?
 - Getting new BMPs in Phase 7 and maybe 2040, How many times do we do this?

Model Updates – How many and when???

- Phase update - Could have 2036-2040 horizon for that
- Version Update(s) – realistically we have from 2030-2040
 - If we agree on what the phase update horizon is, that time becomes smaller