Statistical Eco(-toxico)logy

Improving the Utilisation of Data for Environmental Risk Assessment

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Environmental Risk Assessment (ERA)

Improving Statistics in ERA

Ecotoxicology is not normal

A history of GLM (uncomprehensive)

Statistical Power is unacceptably low

Generalized Linear Models (GLM) can do better

What we learned

Where are we now?

Exploring Monitoring Data for ERA

Environmental Monitoring

Thresholds

Statistics with chemical measurements

Dynamics

Risks

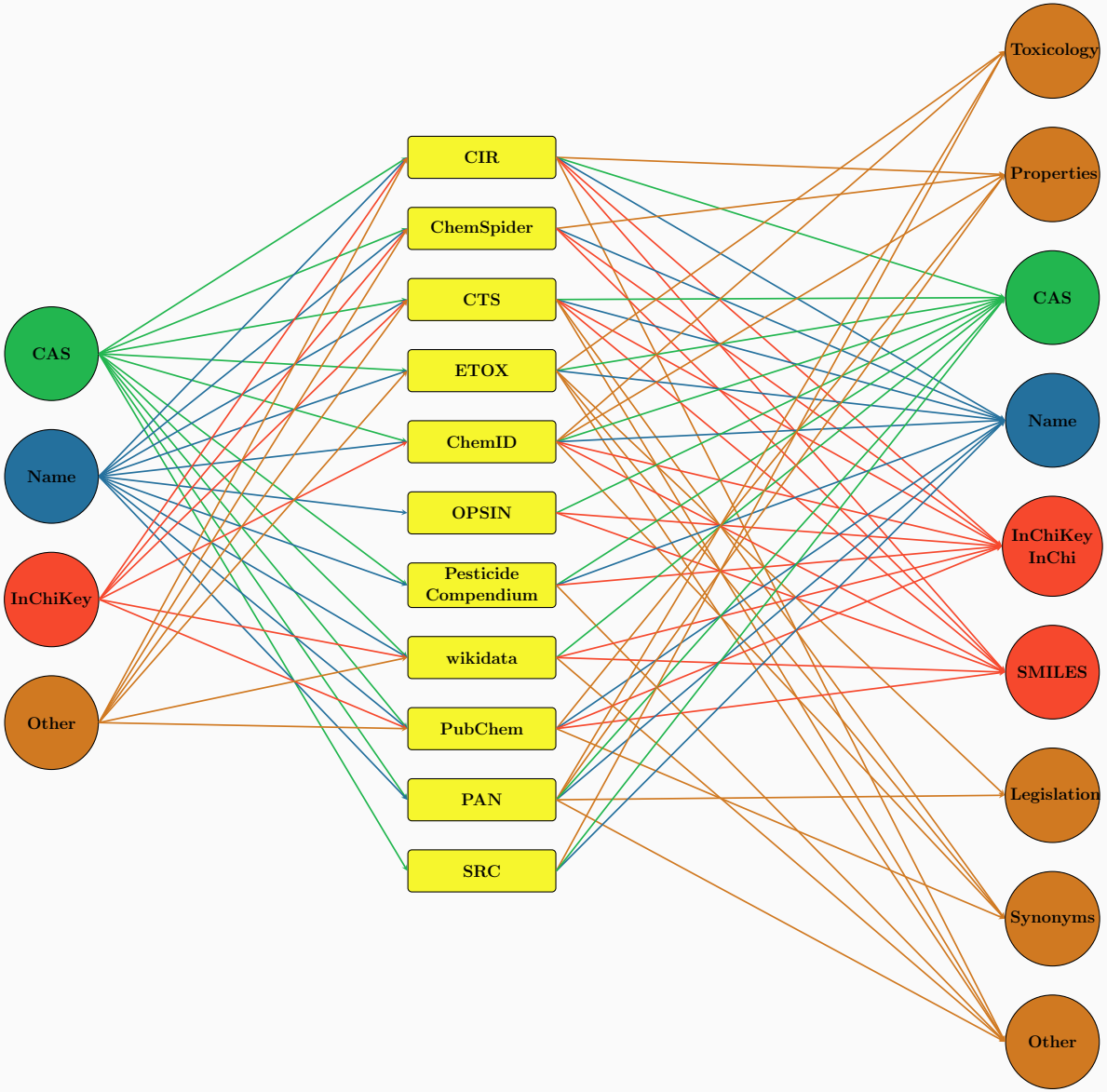
What we learned

Solutions for Linking Data in ERA

Biologists & Chemists face the same problems

Instead of wasting time...

webchem


CAS
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Toxicology
Properties
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SMILES
Legislation
Synonyms
Other

Instead of wasting time...

Recap

What we learned

Improving Statistics in ERA

Block content.

Exploring Monitoring Data for ERA

Block content.

Solutions for Linking Data in ERA

Use my R packages to save your time!

Statistical Ecotoxicology

Improving the Utilisation of Data for Environmental Risk Assessment

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https://github.com/edild/phd_defense

Statistics?

ZAGA what...?

Comparison with Stehle / Knauer?

webchem

taxize

ecology / biota?