

Essential biodiversity workflows in support of policy

W. Daniel Kissling

Institute for Biodiversity and Ecosystem Dynamics (IBED)

University of Amsterdam (UvA)



UNIVERSITY
OF AMSTERDAM



Institute for Biodiversity
and Ecosystem Dynamics

May 2021, 1st stakeholder workshop of EuropaBON

Session

14:30 - 16:00 EuropaBON: Essential biodiversity workflows in support of policy

14:30 Introduction to Session - W. Daniel Kissling (UvA) (Chair)

14:35 EU Bird Monitoring: bird data-flow from collection to policy - Anna Staneva (BirdLife)

14:45 Global Biodiversity Information Facility - Tim Hirsch (GBIF)

14:55 Workflows from habitat monitoring to policy advice: opportunities, gaps and challenges -
Stephan Hennekens (WUR)

15:05 Continental system for forecasting bird migration - Andrew Farnsworth (Cornell U)

Future opportunities and concluding remarks

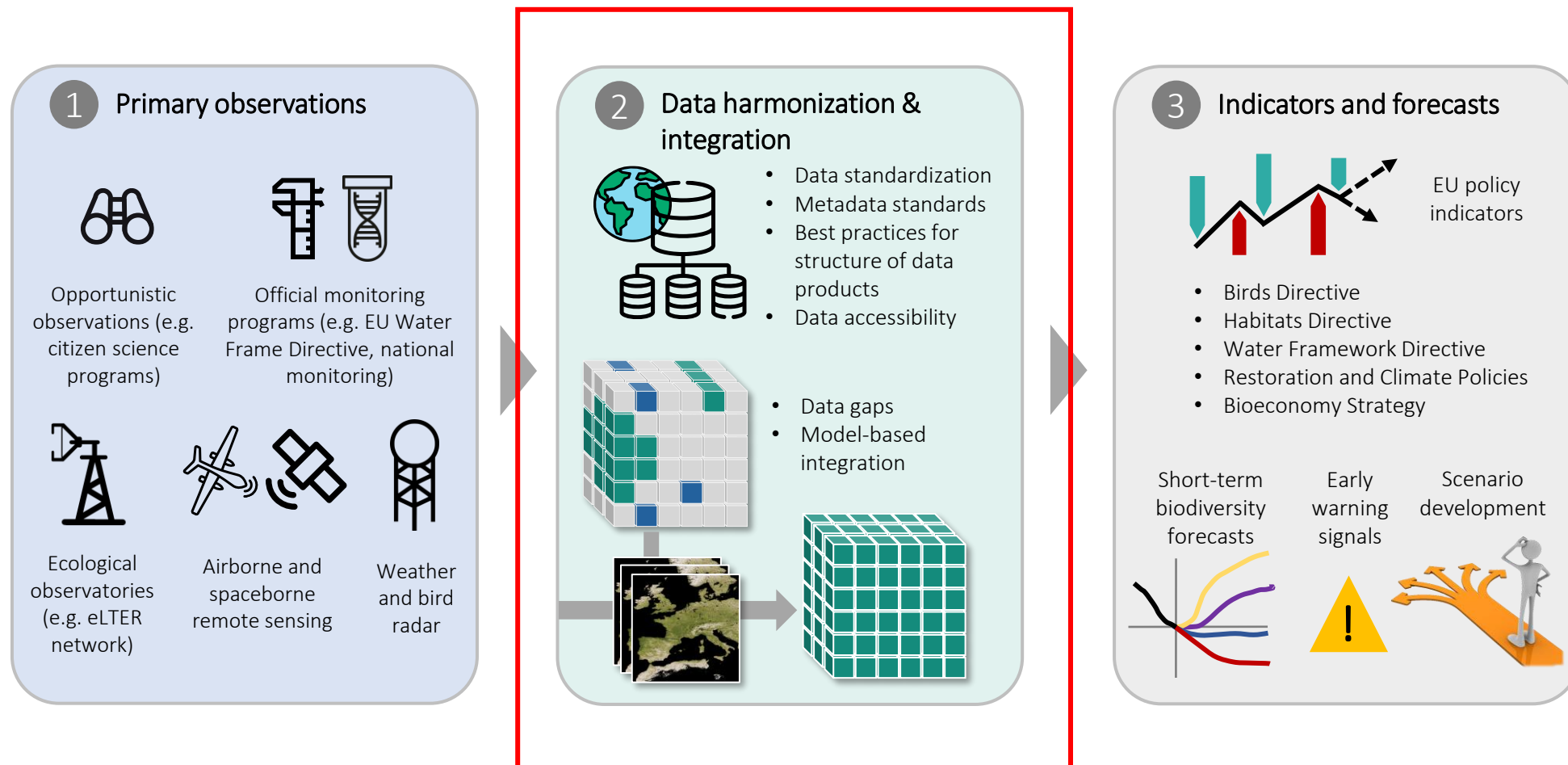
15:15 Reinforcing pan-European biodiversity monitoring activities through synergies between the European Biodiversity Partnership and EuropaBON - Xavier Le Roux (European Co-funded Partnership on Biodiversity)

15:25 Summary and outlook - W. Daniel Kissling (UvA)

15:40 Concluding remarks - Jessi Junker (EuropaBON scientific coordinator)

16:00 Farewell

Essential biodiversity workflows in support of policy



Essential Biodiversity Variables
(EBVs)

Essential Biodiversity Variables (EBVs)

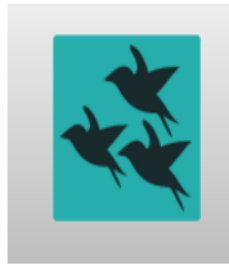
EBVs are a minimum set of complementary measurements that can capture major dimensions of biodiversity change

6 EBV classes with 20 EBVs



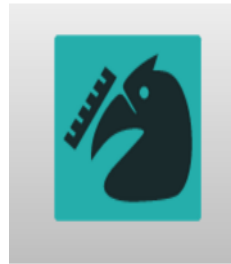
Genetic composition

e.g. Intraspecific genetic diversity



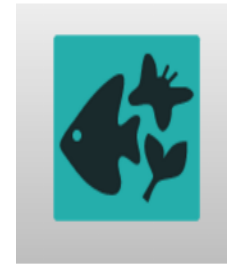
Species populations

e.g. Species distributions



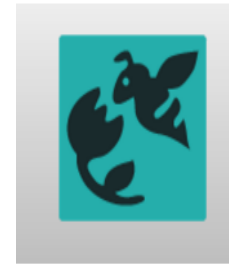
Species traits

e.g. Phenology



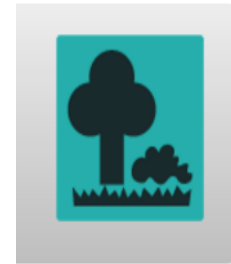
Community composition

e.g. Taxonomic or phylogenetic diversity



Ecosystem structure

e.g. Ecosystem distribution



Ecosystem function

e.g. Ecosystem phenology

<https://geobon.org/ebvs/what-are-ebvs/>

Session

14:30 - 16:00 EuropaBON: Essential biodiversity workflows in support of policy

Primary observations

EBV classes

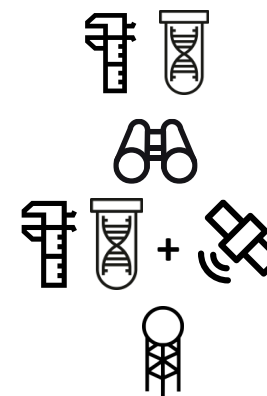
14:30 Introduction to Session - W. Daniel Kissling (UvA) (Chair)

14:35 EU Bird Monitoring: bird data-flow from collection to policy - Anna Staneva (BirdLife)

14:45 Global Biodiversity Information Facility - Tim Hirsch (GBIF)

14:55 Workflows from habitat monitoring to policy advice: opportunities, gaps and challenges - Stephan Hennekens (WUR)

15:05 Continental system for forecasting bird migration - Andrew Farnsworth (Cornell U)



Monitoring programs

Opportunistic observations

Monitoring programs + satellite remote sensing

Weather radar



Species populations



Species populations



Comm. comp. & ecosystem structure



Species traits & comm. comp.

Future opportunities and concluding remarks

15:15 Reinforcing pan-European biodiversity monitoring activities through synergies between the European Biodiversity Partnership and EuropaBON - Xavier Le Roux (European Co-funded Partnership on Biodiversity)

15:25 Summary and outlook - W. Daniel Kissling (UvA)

15:40 Concluding remarks - Jessi Junker (EuropaBON scientific coordinator)

16:00 Farewell

Session

14:30 - 16:00 EuropaBON: Essential biodiversity workflows in support of policy

14:30 Introduction to Session - W. Daniel Kissling (UvA) (Chair)

14:35 EU Bird Monitoring: bird data-flow from collection to policy - Anna Staneva (BirdLife)

14:45 Global Biodiversity Information Facility - Tim Hirsch (GBIF)

14:55 Workflows from habitat monitoring to policy advice: opportunities, gaps and challenges - Stephan Hennekens (WUR)

15:05 Continental system for forecasting bird migration - Andrew Farnsworth (Cornell U)

Future opportunities and concluding remarks

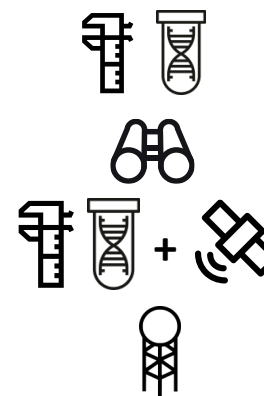
15:15 Reinforcing pan-European biodiversity monitoring activities through synergies between the European Biodiversity Partnership and EuropaBON - Xavier Le Roux (European Co-funded Partnership on Biodiversity)

15:25 Summary and outlook - W. Daniel Kissling (UvA)

15:40 Concluding remarks - Jessi Junker (EuropaBON scientific coordinator)

16:00 Farewell

Primary observations



Monitoring programs

Opportunistic observations

Monitoring programs + satellite remote sensing

Weather radar

EBV classes



Species populations



Species populations



Comm. comp. & ecosystem structure



Species traits & comm. comp.

Summary and outlook

W. Daniel Kissling

Institute for Biodiversity and Ecosystem Dynamics (IBED)

University of Amsterdam (UvA)



UNIVERSITY
OF AMSTERDAM

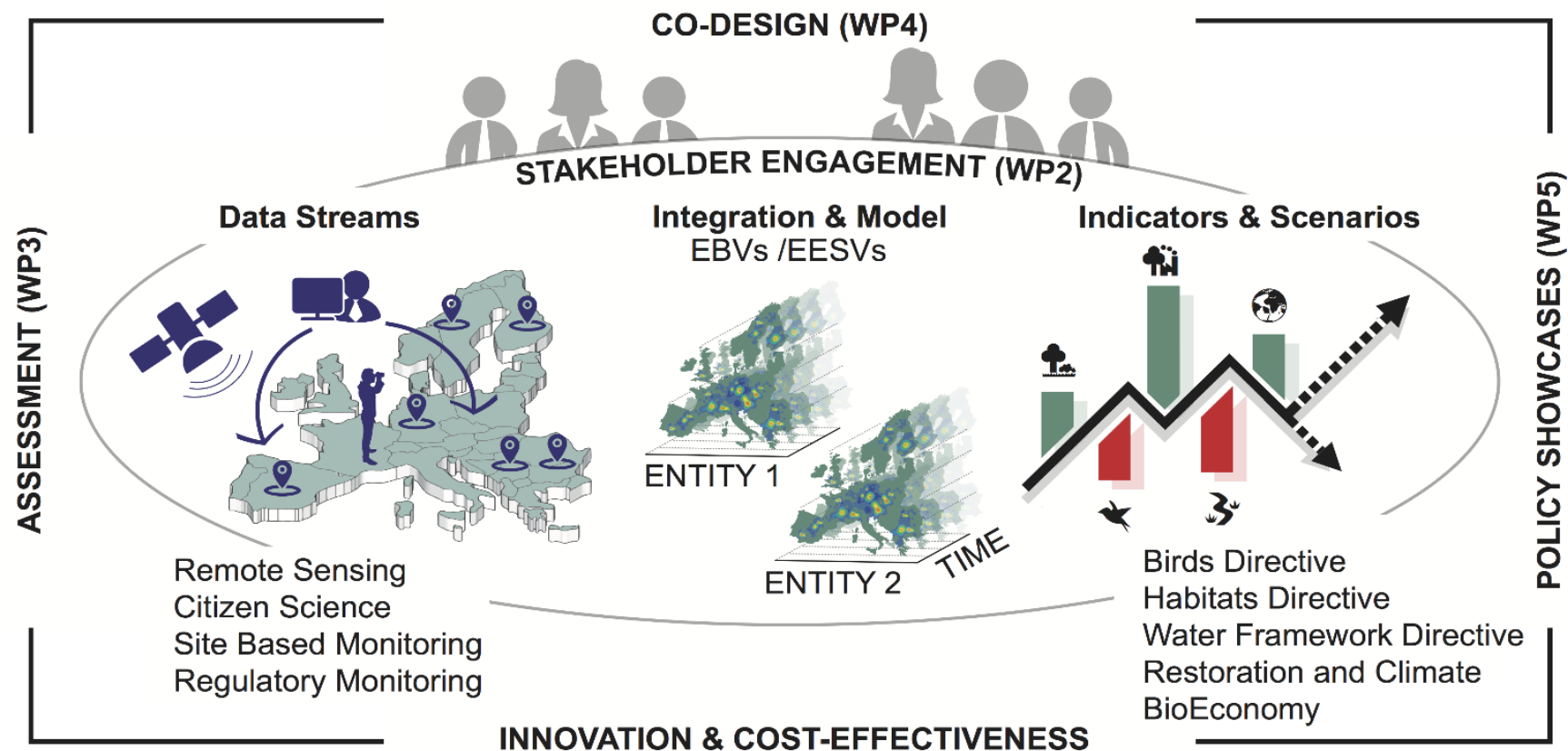


Institute for Biodiversity
and Ecosystem Dynamics

May 2021, 1st stakeholder workshop of EuropaBON

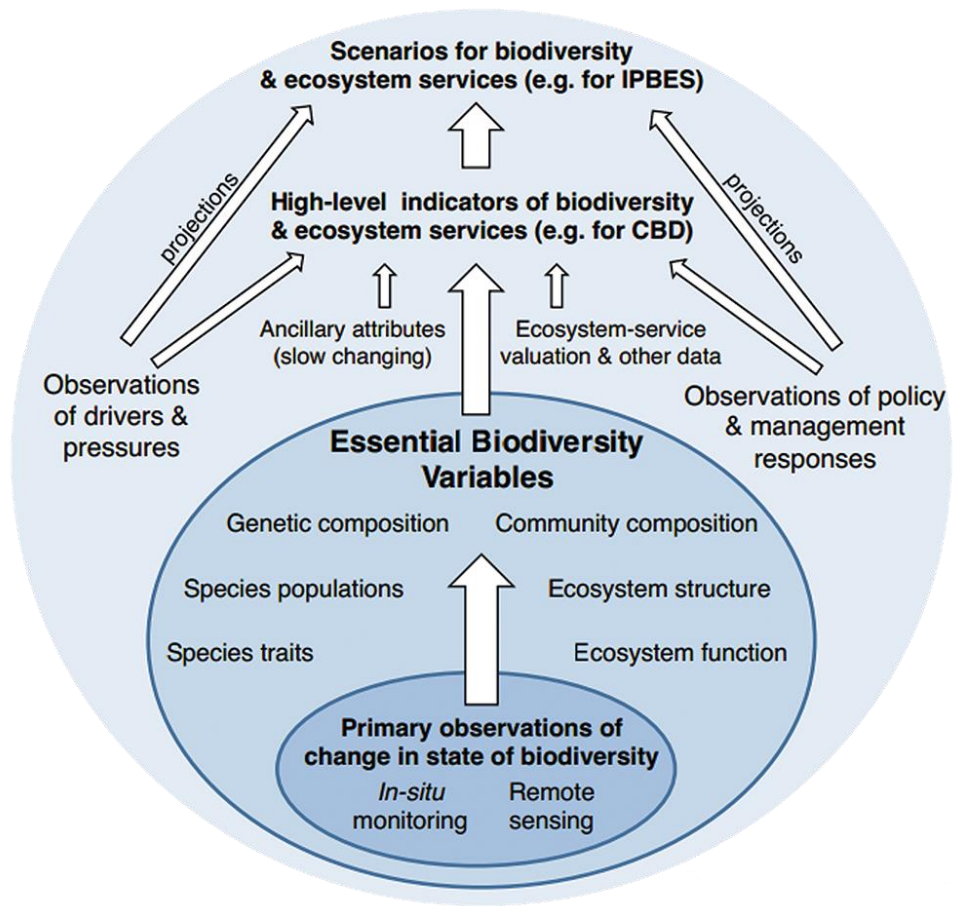
EuropaBON: integrating data streams to support policy

Multiple data collection streams need to be integrated from which indicators, forecasts and scenarios can be derived to inform major environmental EU policies



EBV wishlist

Which EBVs do we want to monitor in the EU, for which taxa and ecosystems, and at which spatial and temporal resolution?



EBV class	EBV name
Genetic composition	Intraspecific genetic diversity
	Genetic differentiation
	Effective population size
	Inbreeding
Species populations	Species distributions
	Species abundances
Species traits	Morphology
	Physiology
	Phenology
	Movement
Community composition	Community abundance
	Taxonomic/phylogenetic diversity
	Trait diversity
	Interaction diversity
Ecosystem functioning	Primary productivity
	Ecosystem phenology
	Ecosystem disturbances
Ecosystem structure	Live cover fraction
	Ecosystem distribution
	Ecosystem Vertical Profile

Thursday & Friday (27-28th May) - Working Sessions

Thursday 27th May

EuropaBON: User needs, policy needs, & linking data to policy

User and policy needs

(plenary & breakout sessions in the morning)

Linking data to policy: existing monitoring schemes, known gaps and challenges

(plenary & breakout sessions in the afternoon)

Friday 28th May

EuropaBON: Mapping the European biodiversity monitoring landscape and how it can inform European policy (with a focus on EBVs and EESVs)

How EBVs and EESVs can inform European policy needs

(plenary & breakout sessions in the morning)

Towards the co-design of EuropaBON

(plenary & breakout sessions in the afternoon)