

HVOR LANGT DRIVER KJEMIKALIEUTSLIPP FRA ET OPPDRETTSANLEGG?

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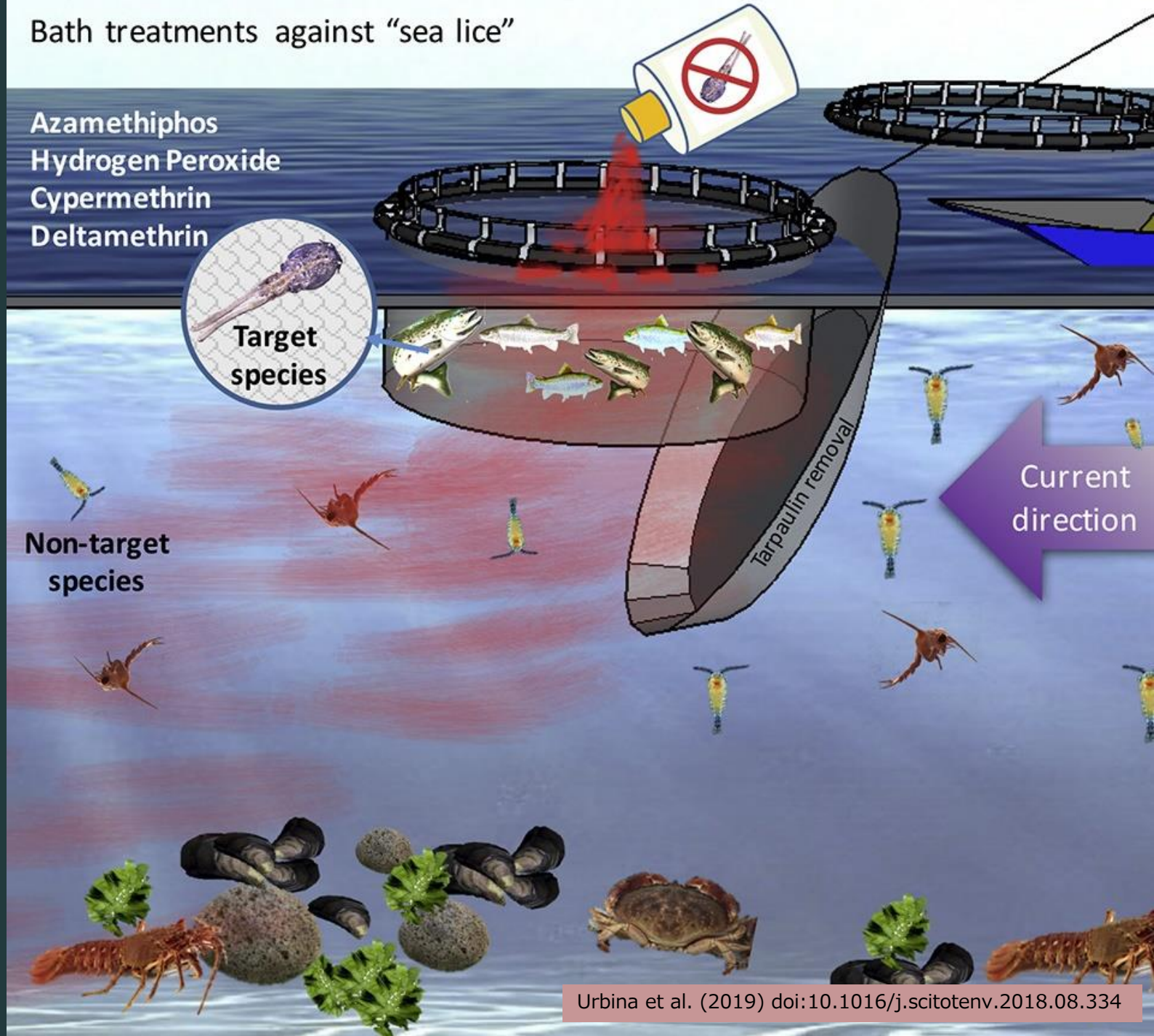
AVLUSNINGS-
MIDLER
KAN SKADE
NON-TARGET
ORGANISMER

Bath treatments against "sea lice"

Azamethiphos
Hydrogen Peroxide
Cypermethrin
Deltamethrin



Non-target species



HVOR MYE TÅLER DE MEST SENSITIVE ARTENE?

Escobar-Lux et al. (2020) doi:10.1007/s00128-020-02996-6

Haugland et al (2019) doi:10.3354/aei00292

Escobar-Lux et al. (2019) doi:10.1139/facets-2019-0011

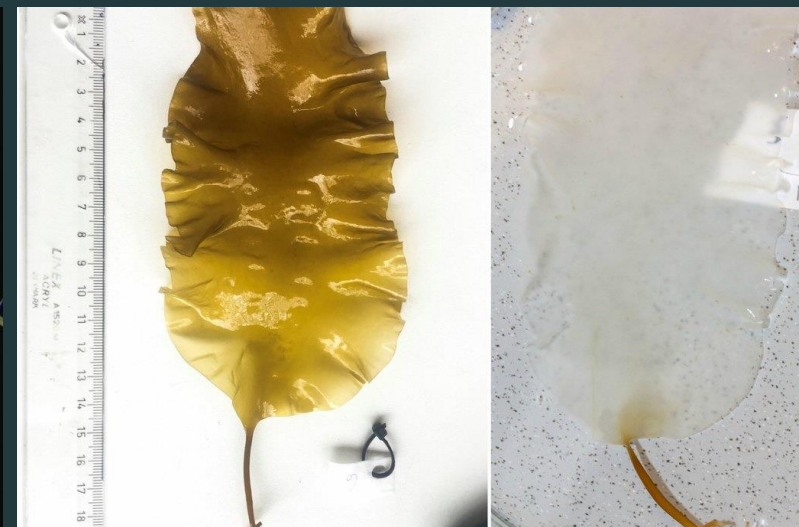
Bechmann et al. (2019) doi:10.1016/j.ecoenv.2019.05.045

Parsons et al. (2020) doi:10.1016/j.envpol.2020.114725

2.1 %



5.4 %

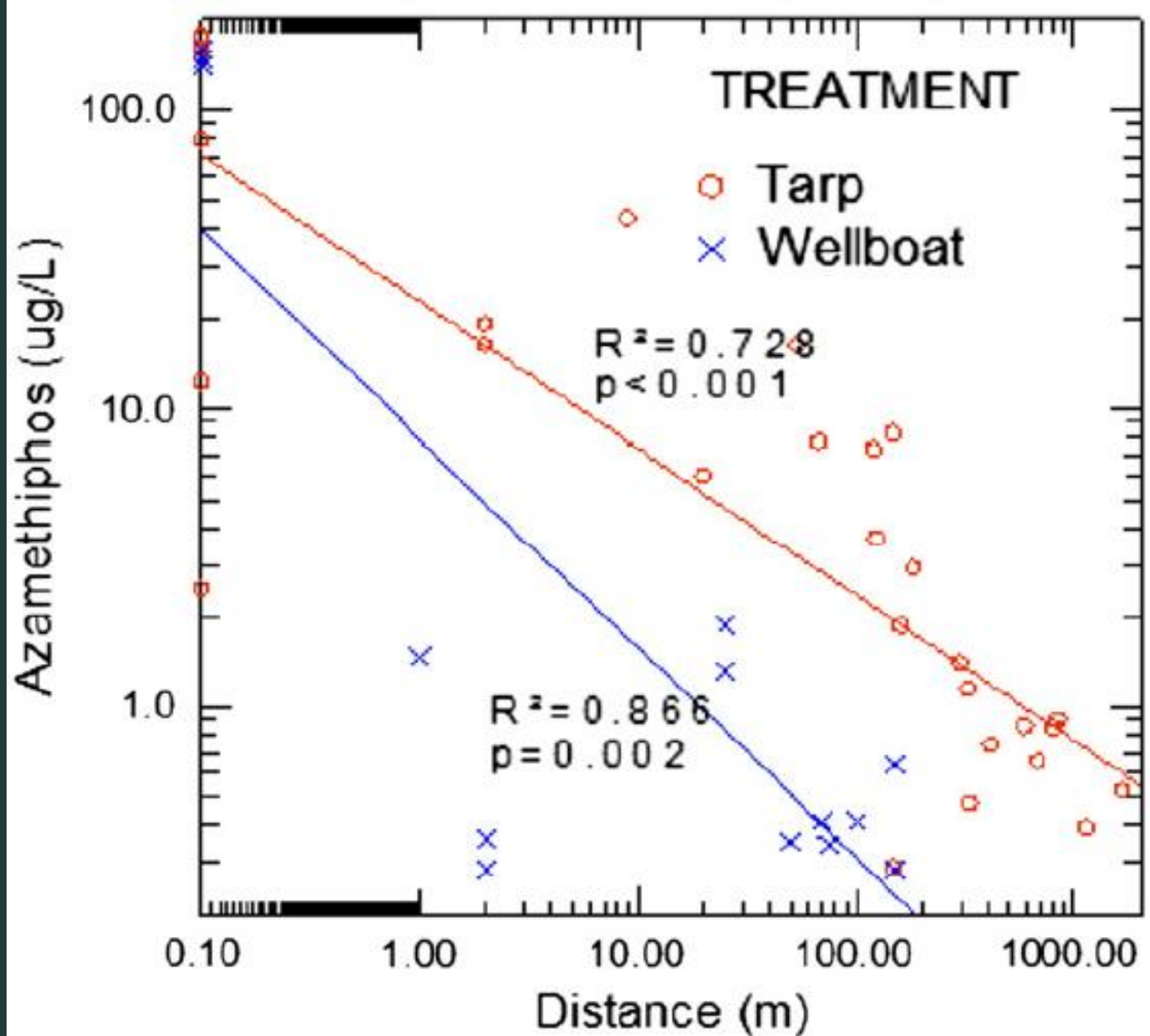


3.3 ‰

1 %

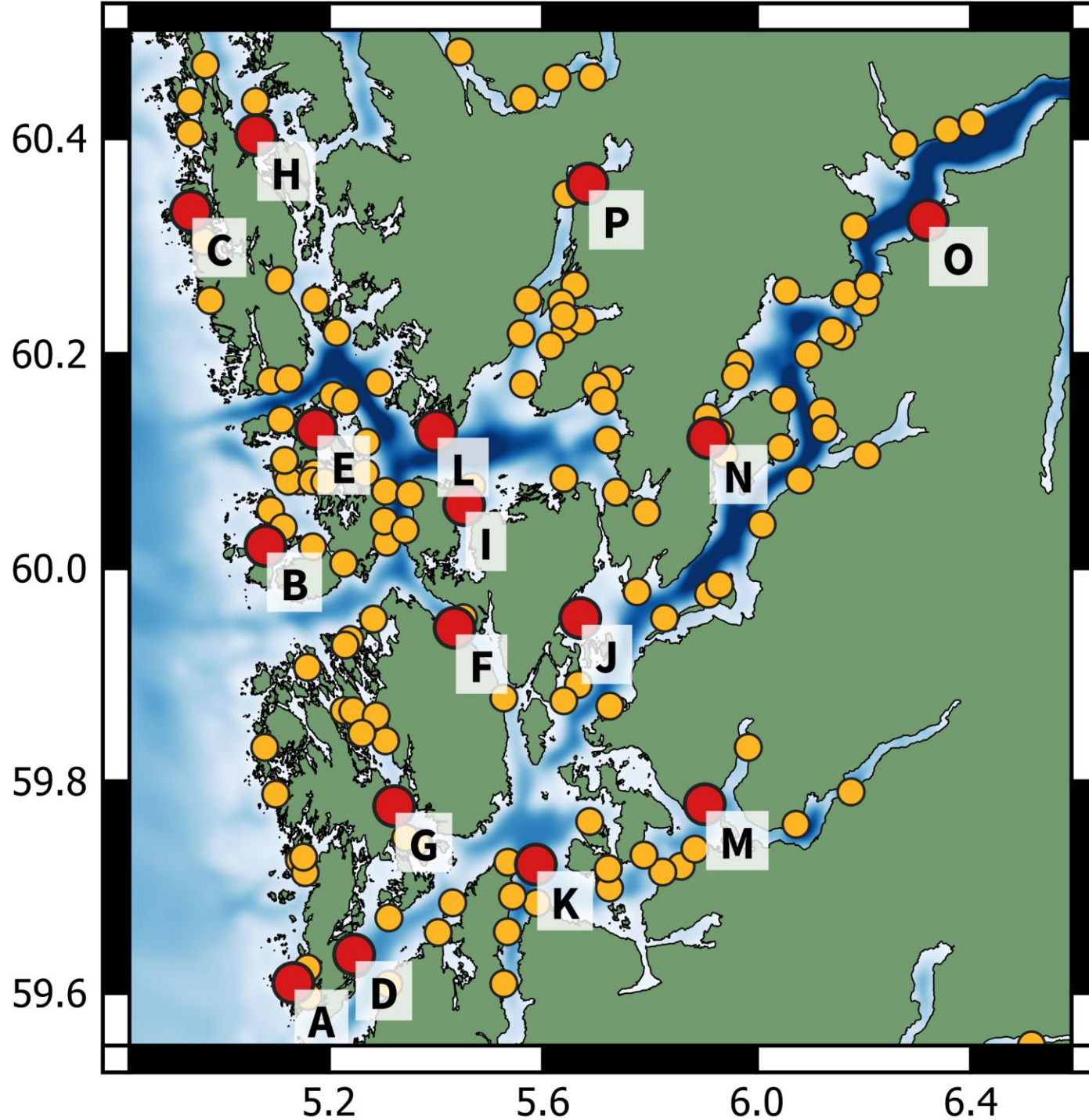
HVOR STOR ER FORTYNNINGS-EFFEKTEN?

Ernst et al. (2014) doi:10.1016/j.aquaculture.2013.12.017

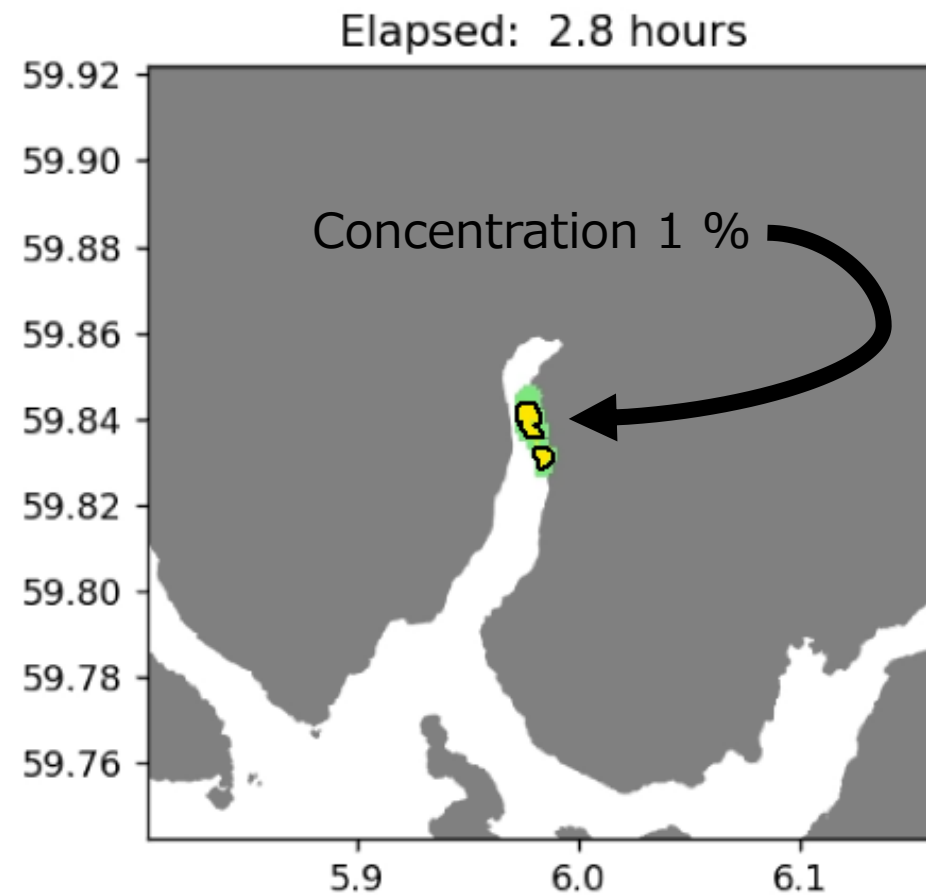


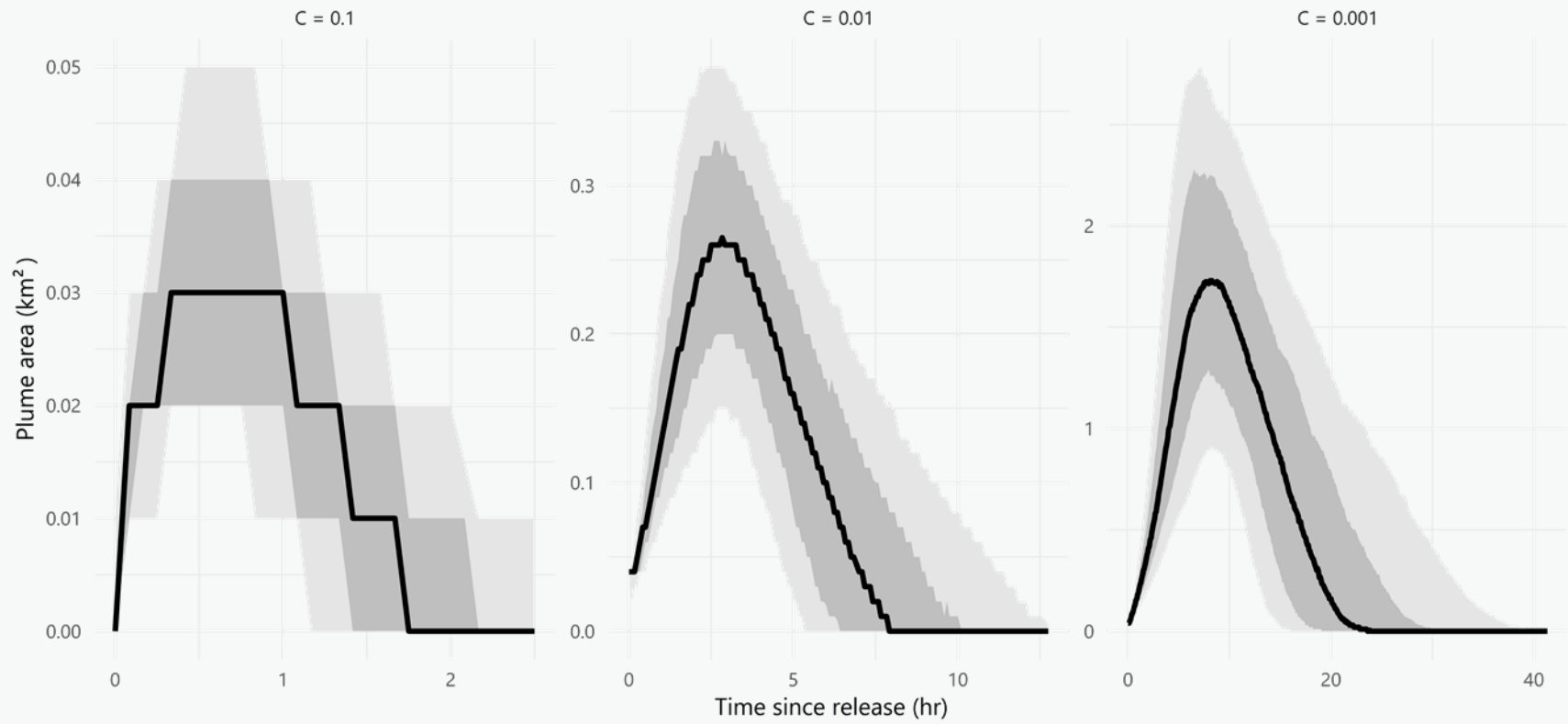
MODELLER KAN VÆRE MER PÅLITELIGE ENN DIREKTE MÅLINGER

Sævik, Myksvoll, Samuelsen, Agnalt (2021) in prep.



MODELLER KAN
VÆRE MER
PÅLITELIGE ENN
DIREKTE
MÅLINGER

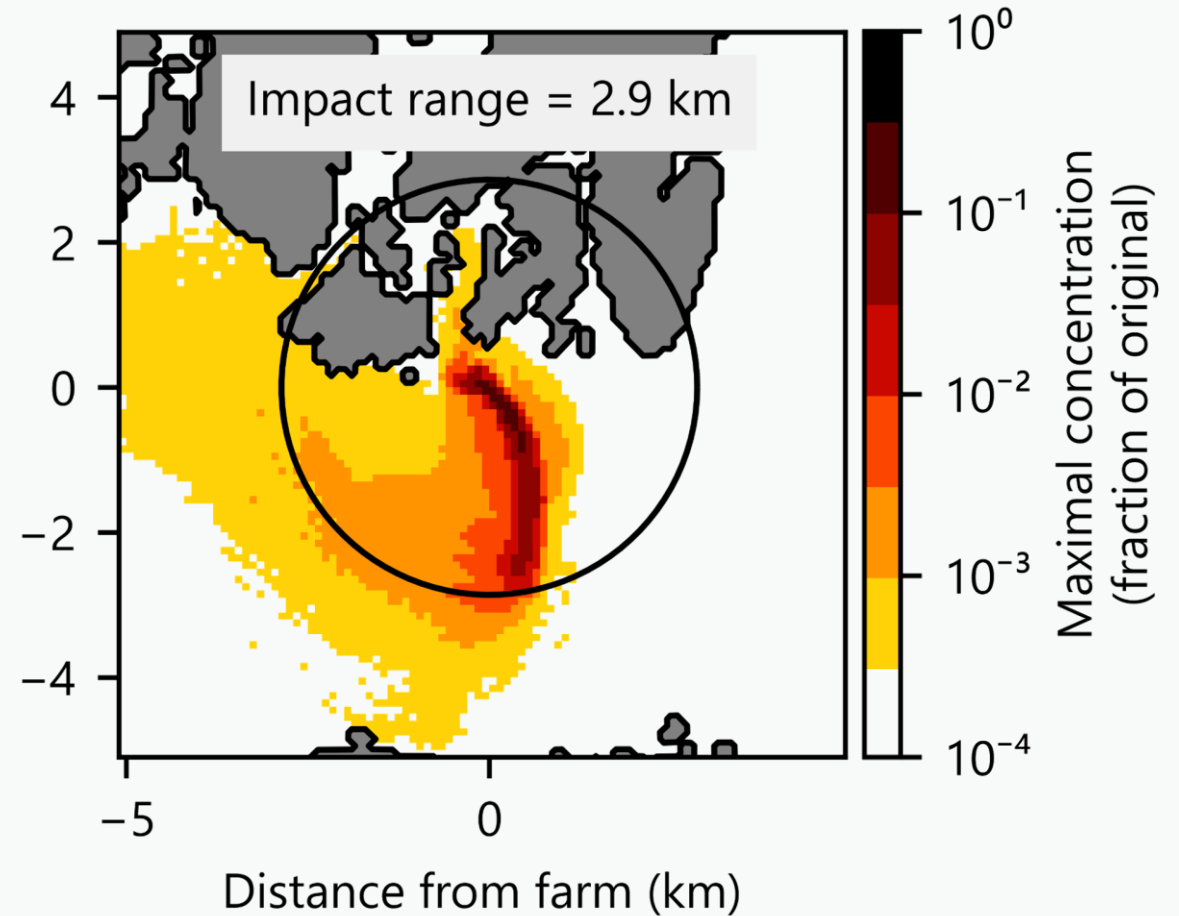




HVOR STOR ER PLUMEN?

Maksimal konsentrasjon i hvert punkt

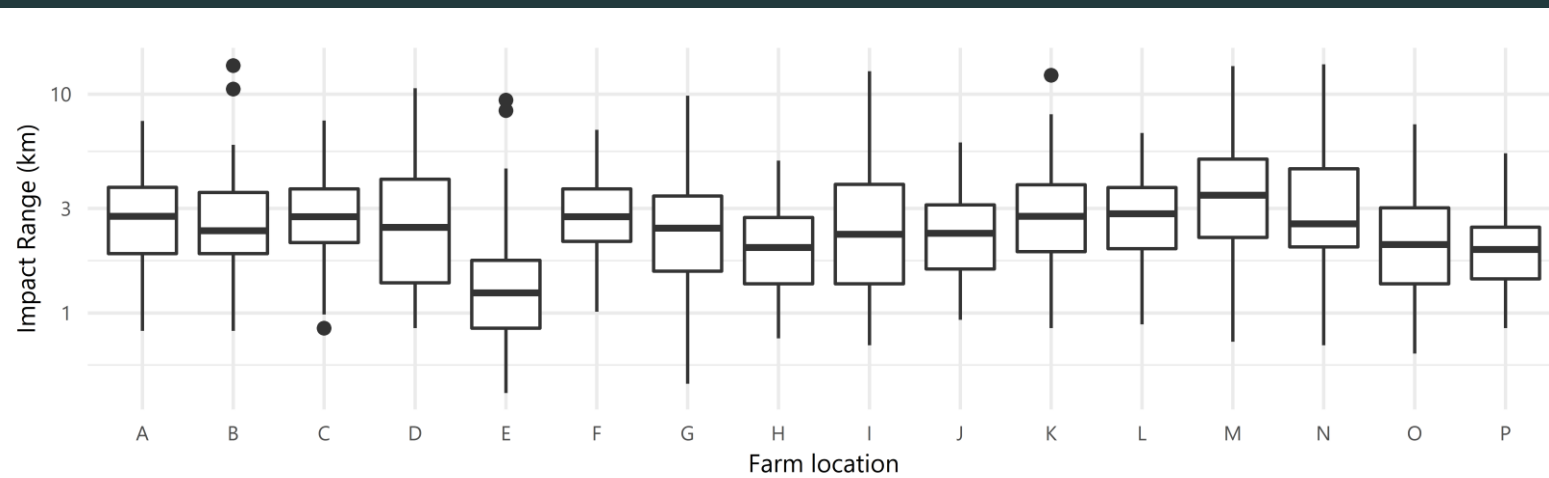
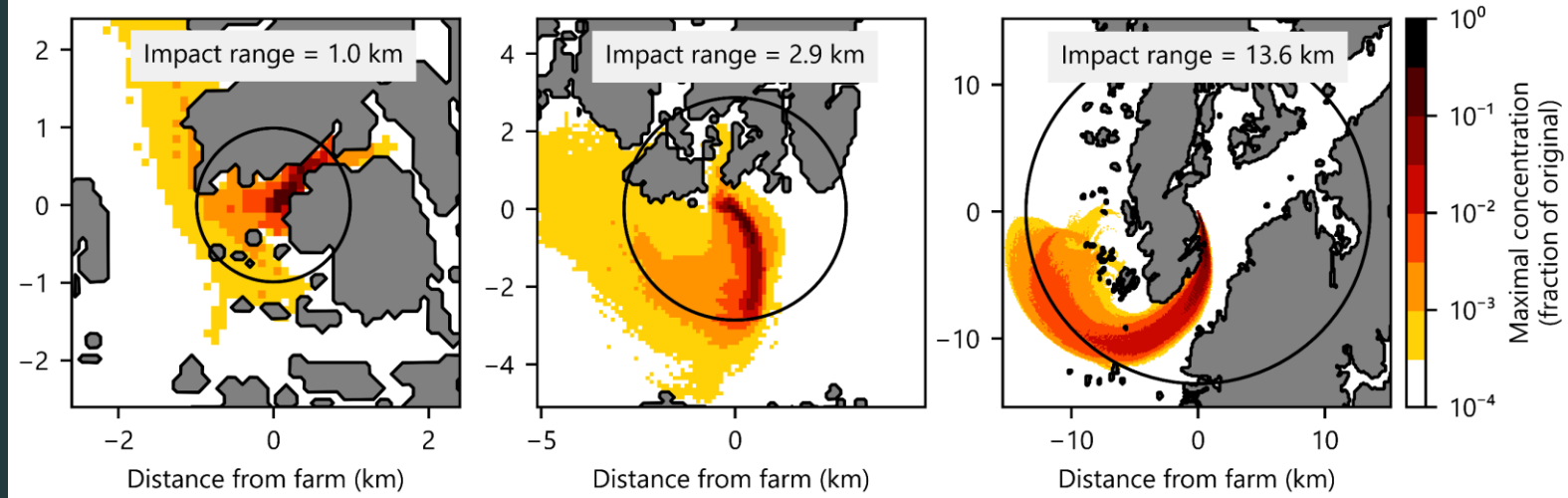
HVOR STORT
OMRÅDE BLIR
EKSPONERT?



Rekkevidden er avhengig av fortynningskravet

Tre ulike lokasjoner og tidspunkt

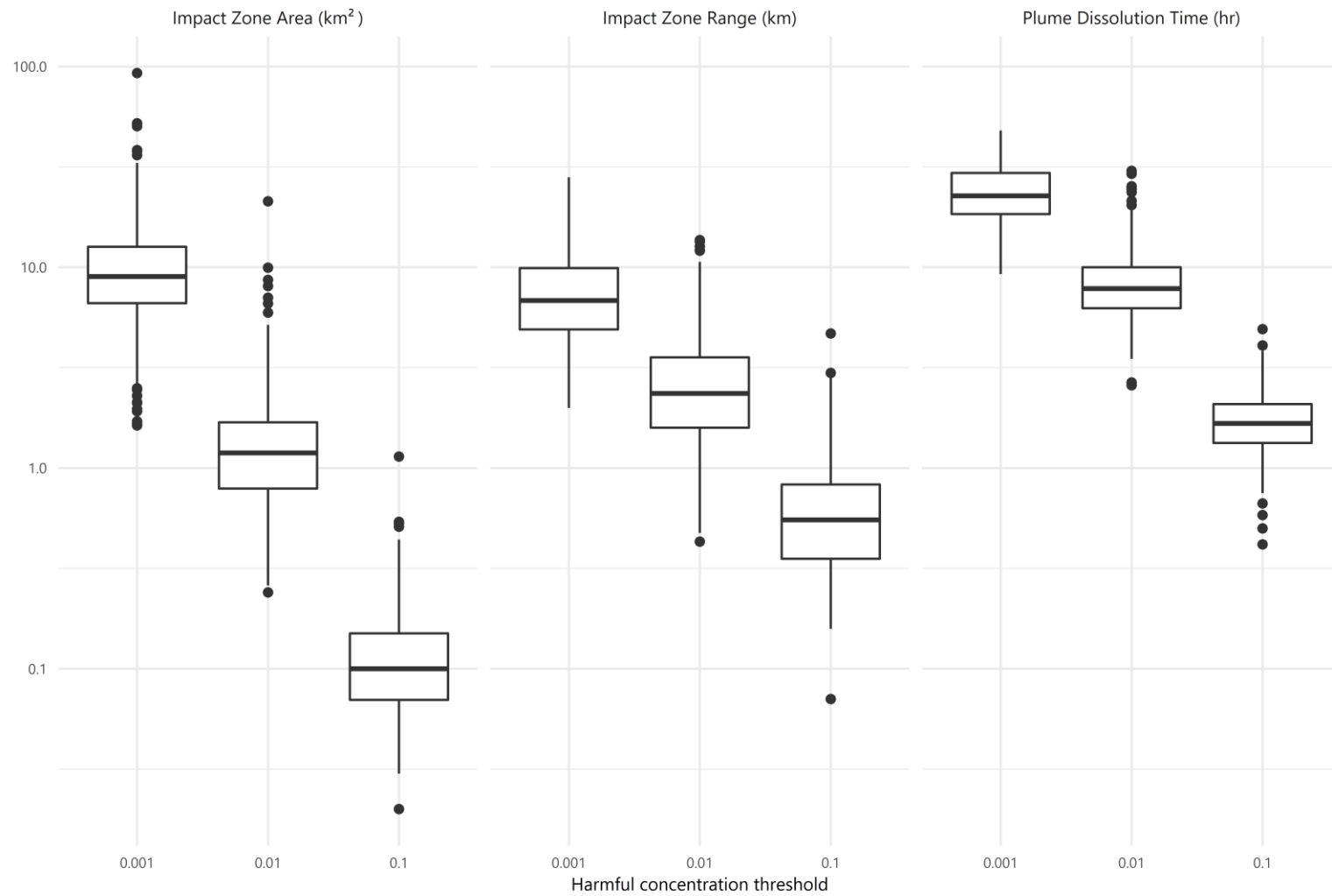
VARIASJONEN
ER SVÆRT STOR



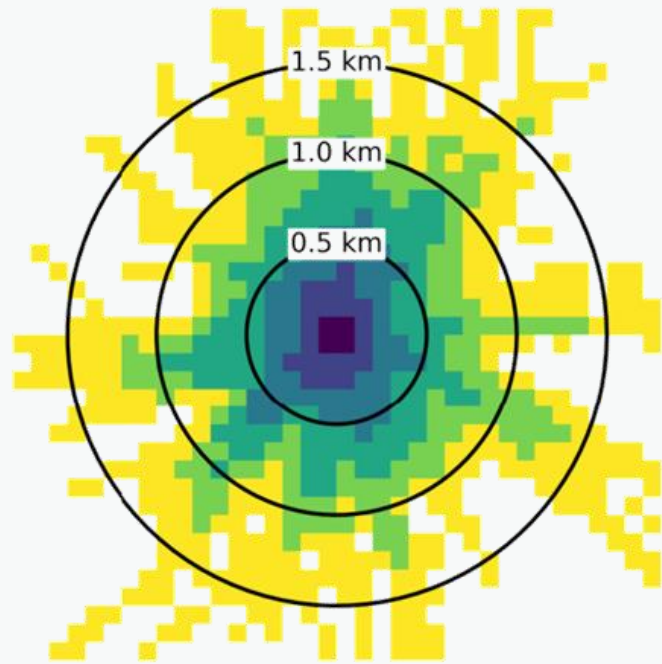
Rekkevidden av en plume på 1 %

TRE PARAMETRE:

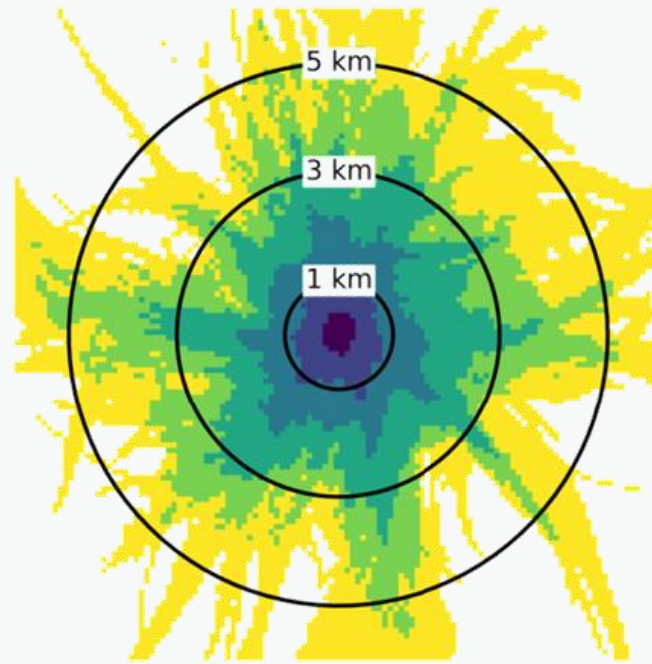
- AREAL
- DISTANSE
- LEVETID



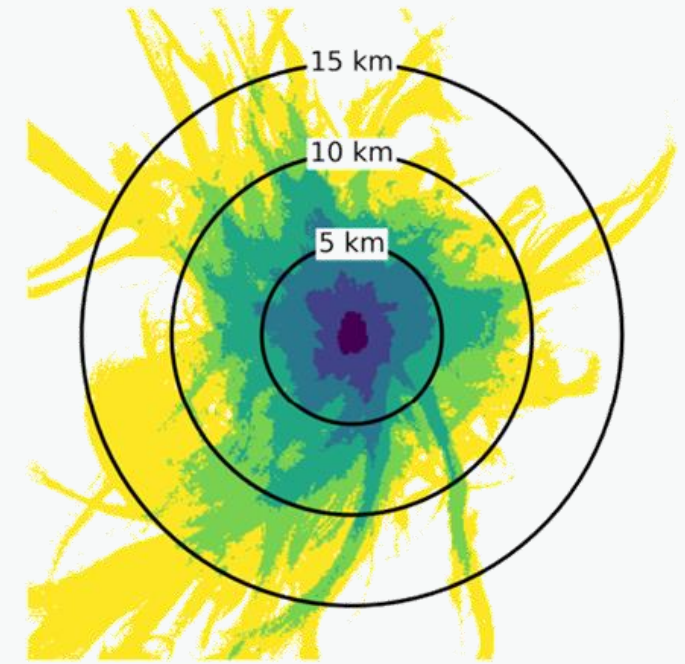
Harmful concentration
threshold = 0.1



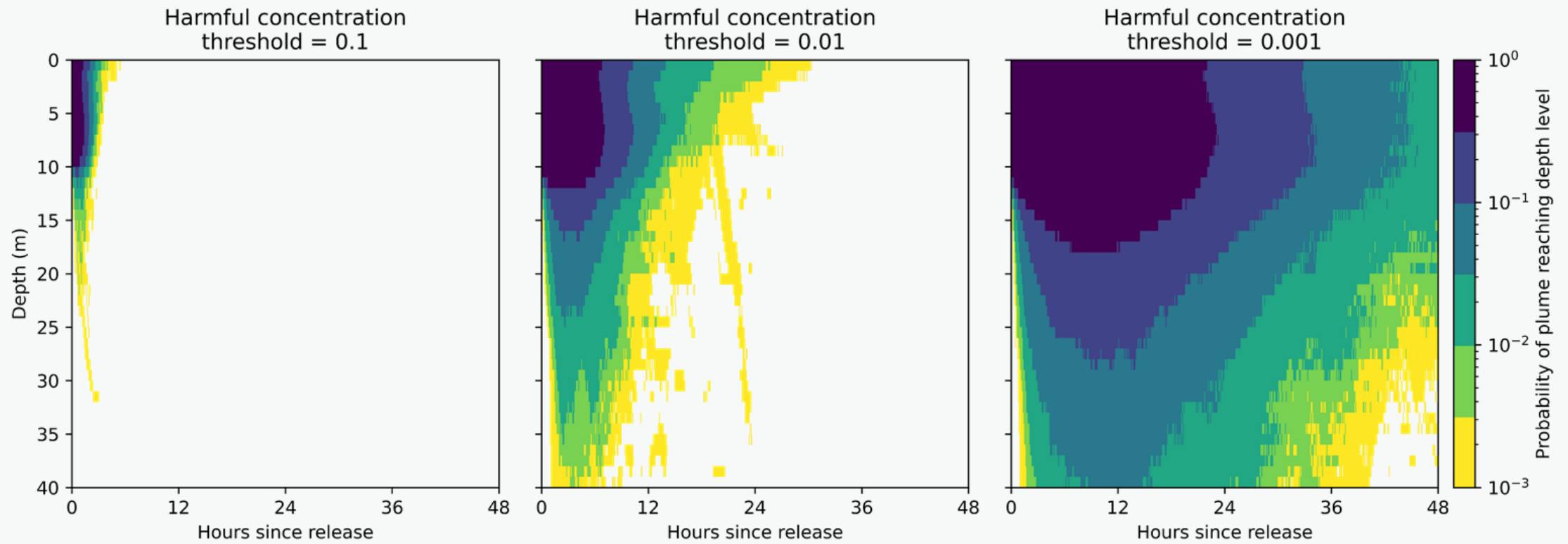
Harmful concentration
threshold = 0.01



Harmful concentration
threshold = 0.001



EKSPONERINGSRISIKO



HVOR DYPT KAN KJEMIKALIENE GÅ?

Antall eksponeringer kan være viktigere enn avstand

ER BUFFER-
SONER EN
FORNUFTIG
STRATEGI?

