

WORKSHOP ON BAUA-RESEARCH PROJECT F2437

TOPIC 3: Project overview

Derivation of occupational exposure limits for airborne chemicals - Comparison of methods and protection levels

Eva Kaiser - FoBiG, Forschungs- und Beratungsinstitut Gefahrstoffe GmbH, www.fobig.de



■ This year w
anniversary

BAuA-Research Project “Derivation of OEL values”

- Project from 2018 – 2021
- Outcome: 10 separate reports
 - Final report with over 800 pages available at the BAuA website
 - Supplemental material

Derivation of occupational exposure limits for airborne chemicals - Comparison of methods and protection levels

Project number: F 2
Institution: Fec
Status: On
Planned end: 2020

Description:

The derivation and setting of occupational exposure limits (OELs) is a current issue, because values are yielded by occupational risk assessment and international processes. On the one hand, values are yielded by occupational risk assessment, on the other hand by international processes.

The objective of this project is the derivation of limit values for airborne chemicals. In this, distributions of single values in the process of deriving limit values will be determined on the basis of a common understanding of the way to build a basis for a health-based approach to values in the EU.

In the following, interim results will be provided to the parties, in particular people involved in the project. The files used for processing will be made available for download.

Publications



Derivation of occupational exposure limits for airborne chemicals - Comparison of methods and protection levels

baua: Report

[→ FIND OUT MORE](#)

Downloads



Supplementary files

Project F 2437 "Derivation of occupational exposure limits for airborne chemicals - Comparison of methods and protection levels"

(ZIP, 677 KB, Not barrier-free file)

[→ TO THE DOWNLOAD](#)

BAuA-Research Project F2437

- Project from 2018 – 2021
- Outcome: 10 separate reports
 - Synthesis report with over 800 pages available at the BAuA website
 - Supplementary material
- Two peer-reviewed articles published in „Journal of Applied Toxicology“, accepted in February 2022

Received: 11 November 2021 | Revised: 25 January 2022 | Accepted: 16 February 2022

DOI: 10.1002/jat.4307

RESEARCH

Received: 11 November 2021 | Revised: 25 January 2022 | Accepted: 16 February 2022


DOI: 10.1002/jat.4305

RESEARCH ARTICLE

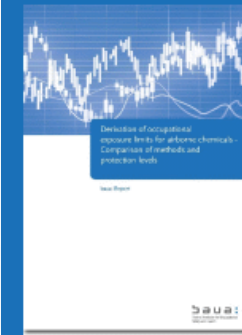
Journal of
Applied Toxicology WILEY

**Derivat
method** Distributions for time, interspecies and intraspecies
extrapolation for deriving occupational exposure limits

Klaus Schn

Marco Dilger¹ | Klaus Schneider¹  | Claudia Drossard² | Heidi Ott² | Eva Kaiser¹

Publications

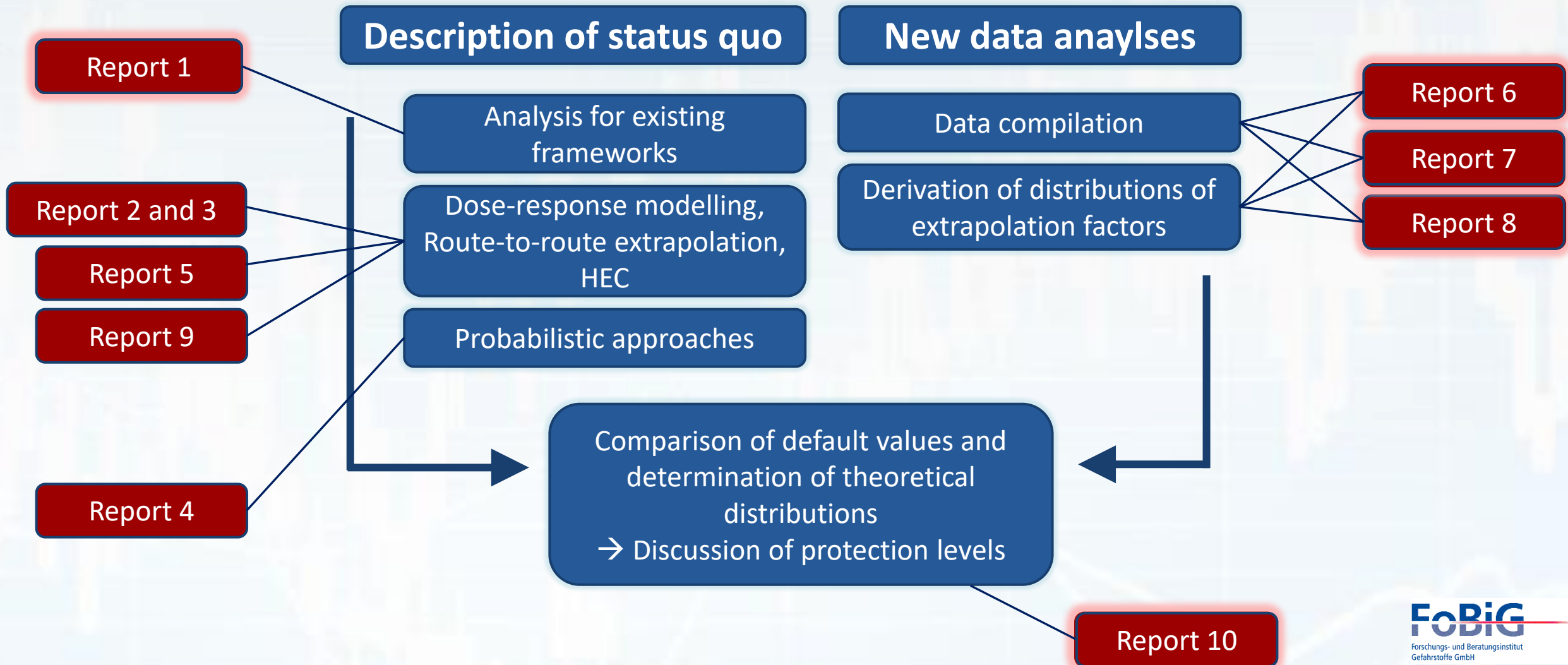


Derivation of occupational exposure limits for airborne chemicals - Comparison of methods and protection levels

baua: Report

[→ FIND OUT MORE](#)

Project structure



Today's agenda

- TOPIC 4: Analysis of methods for deriving OELs
- TOPIC 5: Time and interspecies extrapolation (data evaluations and conclusions)
- TOPIC 6: Intraspecies extrapolation (data evaluations and conclusions)
- TOPIC 7: Discussion of protection levels, with examples
- TOPIC 8: Open questions and steps towards implementation
- TOPIC 9: Plenary discussion

Objectives of the project

- Need for harmonization of methodological approaches for OEL derivation
 - Understand the differences
 - TOPIC 4: Analysis of methods for deriving OELs
 - Create the means to compare
 - Create up-to-date distributions of assessment factors
 - Combine them by probabilistic methods
 - Analyse quantitative differences and protection levels

Who was involved in this project?

- **BAuA:**
 - Claudia Drossard
 - Heidi Ott
 - Thomas Gebel
- **FoBiG**
 - Klaus Schneider
 - Marco Dilger
 - Eva Kaiser
 - Fritz Kalberlah
- **Support from Werner Wosniok, University of Bremen**
- **Thanks to Elke Büdeker for her organisational support and to everybody who helped to realise this event**
- **Advisory Board**
 - Ulrike Bernauer, BfR
 - Annette Bitsch; Fraunhofer ITEM
 - Thomas Brüning, IPA
 - Rüdiger Bartsch, MAK Commission
 - Eberhard Nies, IFA
 - Brigitte Simon-Hettich, Merck, UAIII
 - Gisela Stropp, Bayer AG, UAIII