

Handbook on Water Allocation in Transboundary Context

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 - Finnish Environment Institute, SYKE
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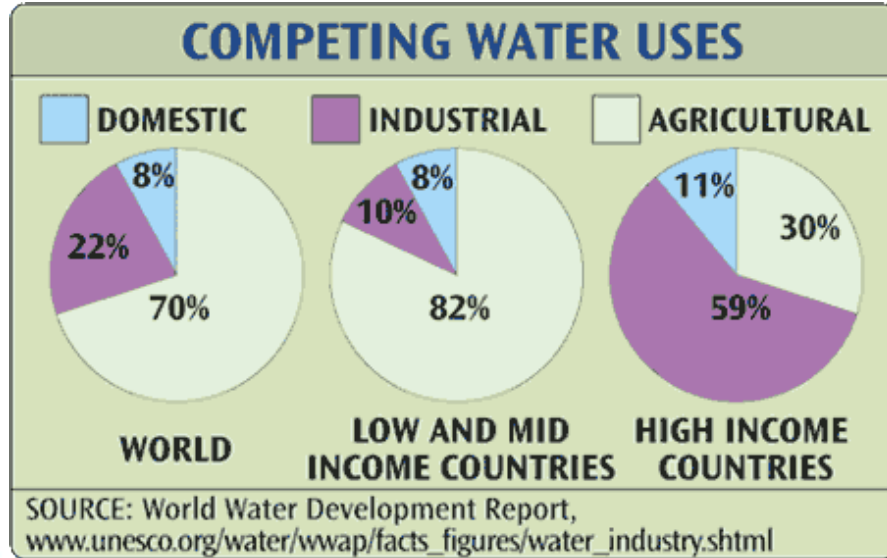
Project team

- University of Eastern Finland, Law School
 - Legal analysis and coordination
 - Center for Climate Change, Energy and Environmental Law: 7 professors, 10 post-doc researchers, 20 PhD researchers
 - Many water law projects, UNEP course on MEAs
 - UEF team: Prof. Antti Belinskij, Univ. lecturer Tuula Honkonen
- Finnish Environment Institute, SYKE, Freshwater Centre
 - Water resources and water quality assessment and management
 - Scientific and technical support to the Ministry of Agriculture and Forestry (responsible of water resources) and Ministry of Environment (responsible of water quality and ecology) in Finland
 - SYKE Freshwater Centre: ca. 100 employees, wide experience of international water projects, water research and information systems
 - SYKE team: Prof. Anna-Stiina Heiskanen, Water experts: Ms Hafsa Munia, Ms Tanja Dubrovin, and Dr Mika Marttunen

Transboundary water allocation

- Water allocation
 - Process of allocating water resources between competing uses and users
 - Average and extreme conditions
- Transboundary water management
 - Equitable and reasonable use of transboundary waters between two or more countries
 - Prevention of transboundary impact
- Successful transboundary cooperation
 - Transparent, just and science-based water allocation
 - International and national measures

Transboundary water allocation



- Available water resources
- Hydrological conditions
- Different uses and functions of water
 - Reconciliation and prioritization
- Supply and demand management
- Availability of technology and related capacity

Climate and development outlook

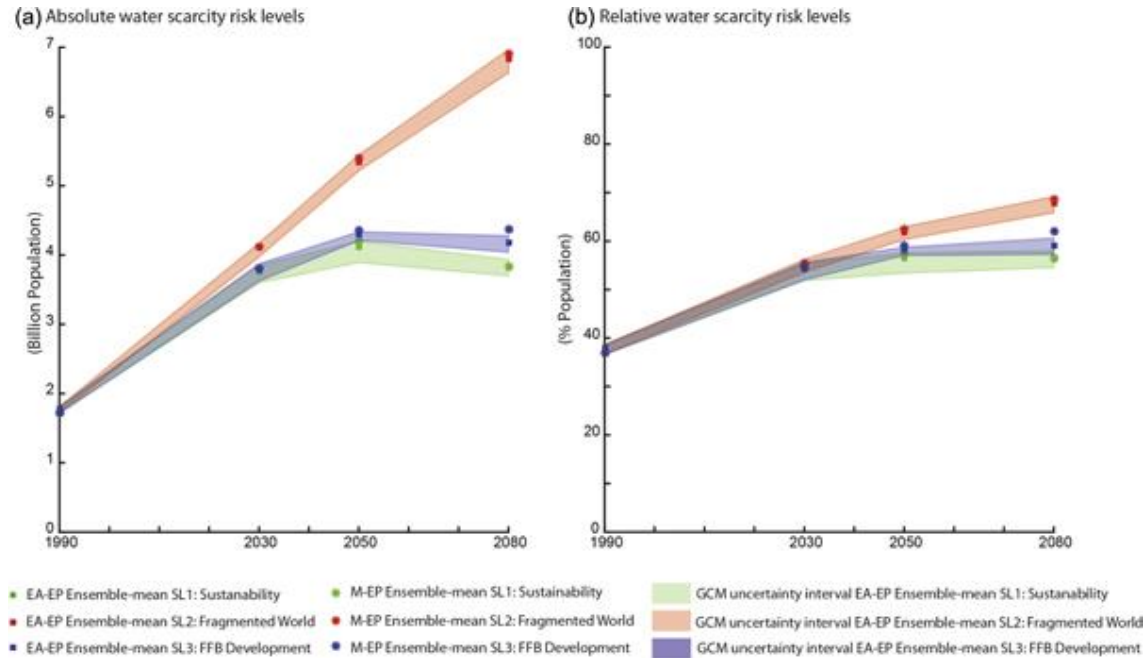
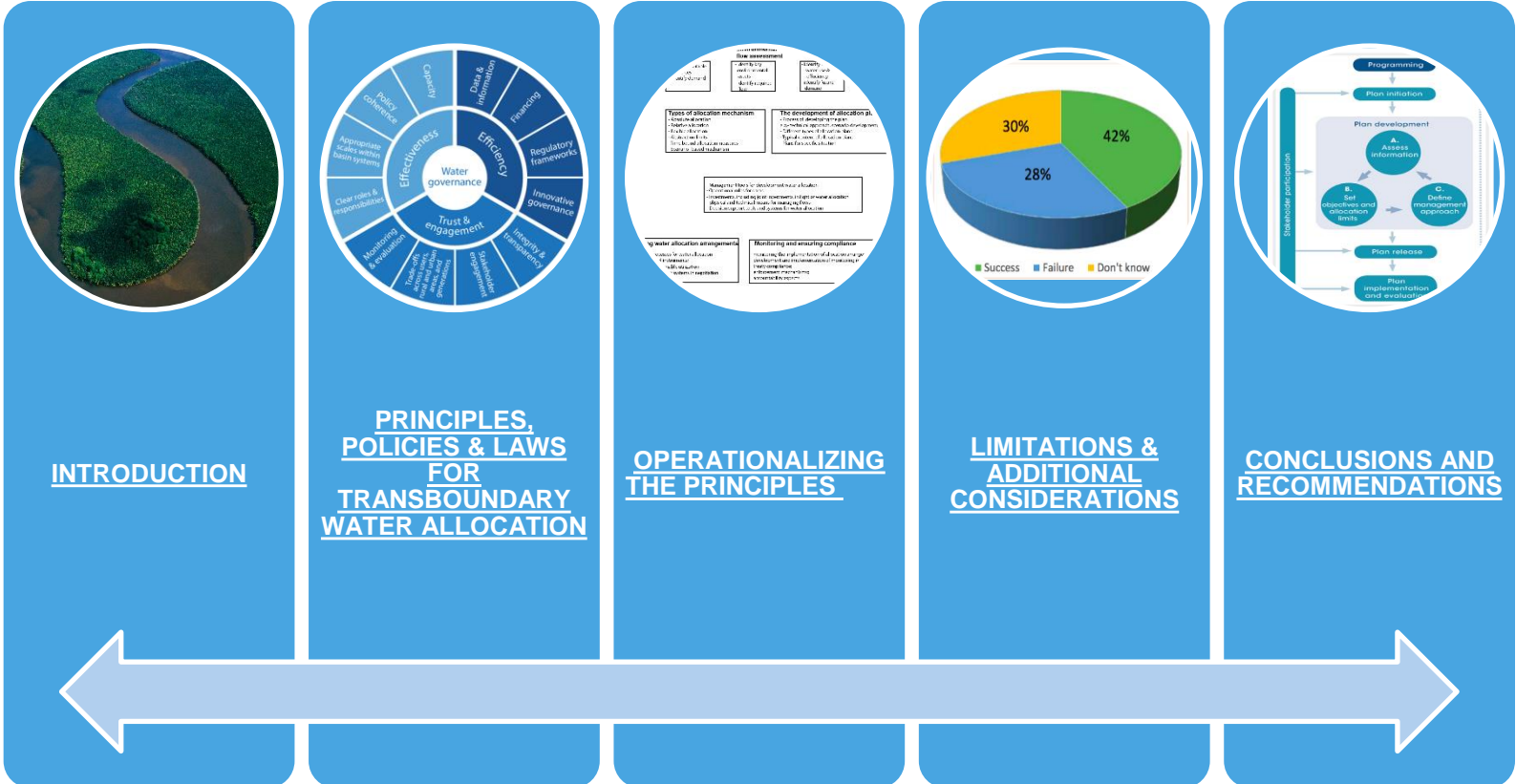


Figure: Forecast of water scarcity under different climate and development outlook

source: <https://iopscience.iop.org/article/10.1088/1748-9326/11/2/024006>

Draft outline of the handbook



I Introduction

- **Aim**
 - Description of water allocation
 - Transboundary context, global water dialogue
 - Water allocation relevance, definitions, objectives, dimensions
- **Possible sub-sections**
 1. Background and brief history of water allocation
 2. Current transboundary approaches to water allocation
 3. Emerging challenges and pressing issues
 4. Integrated water resources management
 5. Institutional frameworks

II Principles, Policies & Laws for Transboundary Water Allocation

- **Aim**

- Discuss guiding principles of transboundary water allocation
- International agreements: global Water Conventions (1992 ECE, 1997 UN), bi- and multilateral treaties
- National laws and policies
- Case studies

- **Possible sub-sections**

1. National laws and policies relevant to transboundary allocation
2. Instruments and key principles of international water law
3. Reconciling competing water uses and needs
4. Benefit-sharing in transboundary basins...

II Principles, Policies & Laws for Transboundary Water Allocation

- **...Possible sub-sections**
 5. Climate and development outlook, water scarcity and adaptive capacity of water allocation arrangements
 6. Flooding and flood management mechanisms in transboundary basins
 7. Economic and policy considerations for determining water allocation
 8. Indigenous and traditional water allocation principles
 9. Emerging principles relevant to allocation of transboundary water resources

IV Operationalizing the Principles

- **Aim**
 - Guidelines for actions to operationalize the principles
 - Water allocation approaches: technical and legal aspects
 - Case studies to illustrate the issue
- **Possible sub-sections**
 1. The decision-making framework
 2. The process for determining water allocations
 3. Knowledge base, information needs, data harmonization
 4. Practical implementation elements
 5. Methods and tools to support implementation
 6. Development of strategies for effective and sustainable water allocation

V Limitations & Additional Considerations

- **Aim**
 - Potential limitations of water allocation approaches and arrangements
 - Diagrams/flow charts summarizing the recommended process for the transboundary water allocation
- **Possible sub-sections**
 1. Limitations of water allocation
 2. Additional considerations

Conclusions and recommendations

- Main considerations to take into account when assessing water allocation arrangements in transboundary context
- Overarching conclusions and recommendations
- Flowchart summarising main elements for allocation arrangements
- Key additional resources and case studies

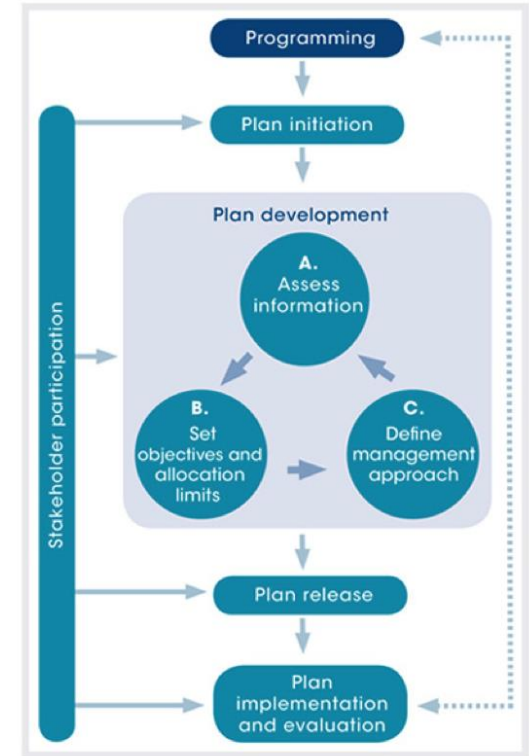


Figure: Example of the water allocation management flow chart.

Source : The Department of Water and Environmental Regulation, the Government of Western Australia

Thank You



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