

# AcquaMind Deliverable 6a

## Nature-Based Solutions: Viable Alternatives for Improving Water Management and Climate Change Adaptation

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| <b>1. Short description (Executive Summary)</b> | <p>This deliverable presents a scientific and practice-oriented overview of nature-based solutions as viable instruments for improving urban water management and climate change adaptation. It explains the green-blue infrastructure concept, the ecological processes underpinning nature-based solutions, their principles, benefits and main implementation categories. Examples from buildings, public spaces, aquatic ecosystems and sustainable drainage systems illustrate applications such as green roofs and walls, permeable surfaces, river restoration, multifunctional gardens and urban regeneration. Case studies from Madrid, Boston, Munich, Seoul, Dresden, Leipzig, Brussels and Cluj-Napoca demonstrate how these approaches can strengthen water regulation, biodiversity, urban resilience and quality of life. The deliverable also identifies enabling conditions and implementation risks, emphasizing context-sensitive design, long-term resources, qualified personnel, collaborative planning, public participation and social inclusion.</p> |
| <b>2. Title</b>                                 | <p>Nature-Based Solutions: Viable Alternatives for Improving Water Management and Climate Change Adaptation</p>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| <b>3. Date</b>                                  | <p>August 2026</p>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
| <b>4. Topic</b>                                 | <p>Climate Change Adaptation, Water Management, Nature-Based Solutions, Green-Blue Infrastructure, Urban Resilience, Ecosystem Services, Sustainability</p>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
| <b>5. Type</b>                                  | <p>Deliverable</p>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
| <b>6. Audience</b>                              | <ul style="list-style-type: none"> <li>• Researchers and academics</li> <li>• Local and regional public authorities</li> <li>• Urban planners, architects and environmental practitioners</li> <li>• Water management and climate adaptation stakeholders</li> <li>• NGOs and civil society organizations</li> <li>• Students and educators</li> <li>• CIVIS Alliance partners</li> <li>• Policy makers involved in sustainability transitions</li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| <b>7. Keywords</b>                              | <p>Nature-Based Solutions, Green-Blue Infrastructure, Urban Adaptation</p>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |