



Ecosystem Service	Abiotic filtration, sequestration and storage of waste
CICES class name	Mediation by other chemical or physical means (e.g., via filtration, sequestration, storage or accumulation)
CICES Section	Regulation & Maintenance (Abiotic)
CICES Class code	5.1.1.3

Sample Indicators















Indicator values from			
Experiment or direct measurement		Survey	
Expert assessment		Statistical- or census data	
Model or GIS		Literature values	
Stakeholder participation		Not provided	

Table 1: Regional Scale

Indicator	Unit	Indicator values from
^[3] Nitrate leaching	kg * ha ⁻¹ * yr ⁻¹	
^[2] Risk of nitrate leaching: exchange frequency of the soil water in the root layer. Infiltration rate divided by field capacity	%	
^[1] Mechanical filtration capacity: infiltration capacity, calculated as: $IC = Perm_{soil} * (1 - s)$ With: IC – infiltration capacity, Perm _{soil} – soil permeability [cm*d ⁻¹], s – share of anthropogenic surface sealing	cm * d ⁻¹	 , 
^[1] Physicochemical filtration capacity, calculated as: $IC_{physicochem} = CEC_{eff} * (1 - s)$ With: IC _{physicochem} – physicochemical filtration capacity, CEC _{eff} – effective cation exchange capacity, s – share of anthropogenic surface sealing)	cmol(+) * kg dm ⁻¹	 , 



References

No.	Citation
1	Nordborg M, Sasu-Boakye Y, Cederberg C, Berndes G (2017) Challenges in developing regionalized characterization factors in land use impact assessment: impacts on ecosystem services in case studies of animal protein production in Sweden. <i>International Journal of Life Cycle Assessment</i> 22(3): 328-345. DOI: 10.1007/s11367-016-1158-x
2	Bastian O, Lupp G, Syrbe RU, Steinháúßer R (2013) Ecosystem services and energy crops - Spatial differentiation of risks. <i>Ekologia Bratislava</i> 32(1): 13-29. DOI: 10.2478/eko-2013-0002
3	Kay S, Crous-Duran J, Ferreiro-Domínguez N, García de Jalón S, Graves A, Moreno G, Mosquera-Losada MR, Palma JHN, Roces-Díaz JV, Santiago-Freijanes JJ, Szerencsits E, Weibel R, Herzog F (2018) Spatial similarities between European agroforestry systems and ecosystem services at the landscape scale. <i>Agroforestry Systems</i> 92(4): 1075-1089. DOI: 10.1007/s10457-017-0132-3