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Background paper

Session 5a: Urban areas

Summary of comments received on WG1, Discussion Paper 1.2

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Summary of comments received on WG1, Discussion Paper 1.2

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WG1 Discussion paper 1.2 covered several interrelated but separate issues relating to 1) the scope of ecosystem accounting for urban areas, 2) the selection of an urban ecosystem accounting area boundary (EAA), as well as 3) the elaboration of a classification structure for the urban ecosystem type (ET). It also discussed 4) presentation issues related to reporting of green and blue infrastructure within urban areas in the extent or condition tables. While there were commonalities in some of the comments received, the overall preferences expressed seem to be mixed.

For the first two issues—regarding the scope of ecosystem accounting in urban areas and whether or not guidance should be issued on the delineation of ecosystem account boundaries for urban areas—responses indicated that guidelines should not be issued, that they should be very flexible if issued, or that they should be provided to encourage comparability. It seems clear from responses that specific ecosystem accounts for urban areas will not be compiled universally. Some countries have both a policy need and the data to report on the extent and condition of green and blue infrastructure within urban areas at a scale that could be as detailed as 1 m patches of grassland or lines of trees. For other countries, this level of reporting is not a priority and is currently not feasible based on the data. For these countries the focus would likely be changes in the total extent of urban built-up area at a national, sub-national or metropolitan scale rather than detail on the green/blue embedded within this area. Given the above, it may make sense to provide some basic but optional/flexible suggestions on how the EAA might be reported to aid countries that will be compiling ecosystem accounts for urban areas and to maximize their usefulness for other reporting needs (e.g., SDGs and others).

Comments indicate that several issues might be clarified. For example, there was some agreement that the definition of ecosystem assets (EA) does not work well in urban areas. Comments were received on the need to be clear whether SEEA EEA was concerned with all green space or only green space that is publicly accessible.[1] It was also suggested by one reviewer that urban areas are not ecosystems but rather a reporting boundary within which there are specific natural ecosystem assets that should be counted in detail, which might imply some confusion with the ET classification structure and the EAA definition proposed in SEEA EEA.

The paper was initially written with the assumption that a hierarchical classification for urban areas was desired (issue 3). From the responses, it is not clear that there is full agreement. Comments on the hierarchical structure for an urban ET class were mixed, with some indicating general agreement with the suggested sub-type characteristics (use, density, asset type etc.), some indicating that access and ownership are also important, and others suggesting that only a single (i.e., urban built-up) or possibly two-level urban ET class structure is needed. It was also suggested that the inclusion of urban ecosystem

[1] As this topic was not covered in detail in Discussion paper 1.2, possibly some confusion has arisen with regards to overlap with DRAFT SEEA Technical Note Access to public open space in cities – SDG 11.7.1.

type sub-class detail be driven first by the need to distinguish the particular services provided by each sub-type.

There was general acknowledgment that data resolution has a major impact on the compilation of urban/green extents and that the highest resolution data available be used in urban areas given that they are price rich. Agreement was expressed that classes for urban green/blue areas should not duplicate natural and semi-natural sub-types. This latter point implies either that green/blue assets be attributed to their natural/semi-natural ET (logical when the asset is large, but problematic for a top-down assessment of ET and mutual exclusivity when applied to backyards or soccer pitches), that clearly differentiated urban ET sub-types be defined for the embedded green/blue assets in urban areas, or that embedded green/blue not be considered an urban ET sub-type but rather a feature of the built-up area (i.e., indicator in the condition table such as % green).

With regards to where information on urban green/blue extents should be reported (i.e., extent or condition tables, issue 4), there was a mixed response and reasonable arguments provided for the different positions. Taking into account these different arguments, the following considerations may provide useful guidance. 1) Where an urban EAA includes large natural and semi-natural areas (depends on boundary selection (inclusion of peri-urban) and presence of large parks) it likely makes the most sense to report these areas within the extent table. 2) Should the urban ET class structure be limited to built-up area or other top-level subclass, then there is a strong rationale to report the embedded smaller-scale green/blue as an indicator of condition (e.g. % imperviousness, % green). 3) Should the urban ET class structure be extensively defined and should data be available to account for green/blue features at the scale of publicly accessible local parks, private residential yards or even individual trees, these could theoretically be reported in either extent or condition tables since "the extent of 'minor' ecosystem types can be registered in the ECI [ecosystem condition indicators] class V [Landscape pattern], if necessary," as proposed by WG2 Discussion paper 2.3 (Czúcz, B. et al., 2019).) It should also be noted that accessibility is explicitly excluded from the typology of ecosystem indicators proposed in Discussion Paper 2.3., which may also support reporting in detailed extent account tables for urban EAA.

Further exploration, testing and resolution of these issues, including the classification hierarchy and definitions for specific urban ecosystem sub types and scale is needed. Consideration should also be given to the possibilities for alignment with the definitions provided by UN-Habitat for SDG 11.7.1.

Expert Consultation Comment Form Question 6: Determining the appropriate treatment of urban areas is not clear cut (Discussion paper 1.2). Consider the following questions:

a) To what extent should the SEEA EEA provide guidance for countries on the delineation of urban EAA boundaries? (e.g., Is there a specific city size threshold that should be considered for ecosystem accounts for urban areas?)

- Many indicated it should be flexible and country-specific based on policy needs and data availability.
- However others indicate some guidance or harmonized approach with existing standards (e.g., Functional Urban Areas (FUA) or Degree of Urbanization) would improve comparability between countries and support other reporting efforts (e.g., SDGs).
- Some note that SEEA must be clear about what should be measured—all green space or just a subset that is public/used for people.

b) For ecosystem accounts focused on urban areas, would you prefer the approach of reporting the relative significance of urban green/blue as part of the extent tables or as part of the condition of the broader urban area? Why?

- Very mixed response.
- As extent – because of logic of reporting areas as extent; so that condition can be reported for each green/blue asset type; because it's important to get an accurate estimate of the extent of different types of green/blue in the urban environment.
- As condition – because green/blue is a condition of the urban area; where less data is available it makes sense; because having too many ET categories is not functional
- As hybrid – report larger continuous natural ET in urban areas as extent, report embedded green/blue urban assets as part of the larger built-up and can be reported on as condition indicators; report green/blue as extent where data exists, but otherwise report on it as a landscape-level characteristic of the urban area in the condition table.

c) Which of the described structural and functional characteristics of urban areas do you consider to be most important for an urban ecosystem typology and how might they be most logically ordered in a hierarchical structure?

- Some responses show general comfort with the characteristics (and order) as presented. Others add that public accessibility is important to include.
- Some indicate this level of detail is not necessary in an urban ecosystem type classification: from a single level or two-level classification only, to recognition that the highest level urban ecosystems types might be clearly defined but sub-types could be defined by users.
- One indicates urban is a management boundary not an ecosystem type – classify all urban/green within urban EAA according to a natural ET with an urban tag (urban lake, urban beach), or functional characteristics (areas of trees for cooling, for pollutant removal, or other issues of interest such as green walls or roofs).

d) **Do you have specific comments on the scale or size of urban ecosystem assets that should be separately identified in a set of ecosystem accounts for urban areas?**

- Leave to countries to determine
- As detailed as possible depending on data availability – e.g., 10m, 1m
- Proposed a size limit of 200 ha limit to differentiate urban green asset from green natural asset
- May require distinction between units of observation and units of aggregation

Additional comments received:

- Definition of ecosystem asset—that they be continuous and that they have all the components to function—is problematic in urban areas. Very fragmented areas can still act as an asset (e.g., street trees and in pocket parks in cities) but small fragments of habitat may not have all the components to function. The definition does not allow for human-determined/dominated ecosystems (e.g., urban, cropland). If we would like to ensure internal consistency, it should be adjusted.
- Although there are practical examples provided in the paper where countries have developed urban ecosystem accounts, there are not sufficient elements for applicability in other regions and situations.

Written responses received to Q.6:

16 using the comment form, 1 providing detailed comments in Word, and 1 set of comment received prior to official circulation for comments.