

AEPDP Technical Advisory Group Guidance Note April 2018, revised June 2018

## GUIDANCE ON THE USE OF BACKGROUND LCI DATA

### 1. PURPOSE

When selecting background life cycle inventory (LCI) data for use in a life cycle assessment (LCA) study that is intended to be published through an Australasian EPD, it is important to use data of adequate quality.

### 2. GUIDANCE

LCA can be undertaken using a variety of data sources and data types in line with the selected goal and scope of that study. To make LCA results comparable, consistency in life cycle inventory is very important, and this is especially the case with EPDs which are intended to be used to compare product options from different EPDs. For this reason when selecting LCI data for use in LCA studies that is intended for publication in an Australasian EPD it is important to use inventory which is consistent with the Australasian EPDs General Programme Instructions and appropriate Products Category Rules (PCRs).

The AEPDP recommends that where possible independently verified data are the first option to be considered.

For Australia and New Zealand, examples of current existing databases that have been independently verified include:

- AusLCI - The Australian National Life Cycle Inventory Database – <http://www.auslci.com.au>
- ecoinvent - <http://www.ecoinvent.org/>
- thinkstep GaBi LCI databases - <http://www.gabi-software.com/international/databases/>

Other (non-verified) databases may be used if:

- There is no alternative unit process data set available in a verified database; or
- The non-verified unit process data set is demonstrably of higher quality than the most appropriate alternative unit process data set from a verified database.

If LCI data are being used within the LCA from non-verified sources, LCA practitioners shall assert their adequacy for use in the LCA. Verifiers shall check that the adequacy of LCI data from non-verified sources is addressed in the LCA background report. Adequacy is determined (but not limited) by considering the following key criteria relating to background LCI data:



- Selection and use of generic data and background data is justified and their validity is demonstrated
- Data have been selected as follows:
  - < 10 years for background data
  - Technical background complies with physical reality
  - Integrity of generic data records, system limit and cut- off criteria for generic data records validity demonstrated
- Documentation on data / background data includes:
  - Name of the (background) data record, its source (database, literary source etc.), year of data collection and its representativeness
  - Handling of missing data
  - Data quality assessment.

### 3. FURTHER INFORMATION

For further information and background please refer to:

- The International EPD Scheme. 2017. 'General Programme Instructions (GPI)'. Version 3.0. Sweden (<http://www.environdec.com/en/The-International-EPD-System/General-Programme-Instructions/>)
- Data requirements of the relevant Product Category Rules (PCR).  
For building and construction products these PCRs include:
  - Product Category Rules (PCR) 2012:01 Construction products and Construction services, 2017, Version 2.2, The International EPD System (<http://www.environdec.com/PCR/Detail/?Pcr=8098>)
  - EN 15804:2012+A1:2013 Sustainability of construction works, Environmental product declarations, Core rules for the product category of construction products (<https://shop.bsigroup.com/ProductDetail/?pid=000000000030279721>)
- LCI databases:
  - The Australian National Life Cycle Inventory Database (<http://www.auslci.com.au>)
  - ecoinvent (<http://www.ecoinvent.org/>)
  - thinkstep GaBi LCI databases (<http://www.gabi-software.com/international/databases/>)



## 4. TREATMENT OF EXISTING PUBLISHED EPDS

This guidance is not retrospective.

It has been developed to assist practitioners and verifiers and does not take precedence over the General Programme Instructions, Product Category Rules or other applicable standards.

