

## What's new in GaBi Databases '14 and how it benefits you.

### Questions and Answers

The following are questions and the corresponding answers from the PE INTERNATIONAL webinar titled "What's new in GaBi Databases '14 and how it benefits you" which took place on 18<sup>th</sup> November 2014. The questions are in no particular order.

<b>Q: It will be possible to exportecoinvent datasets?</b>
A: Yes, of course it will be possible to do this, via the ILCD exchange format.
<b>Q: The new update of the database contains an independent process for the mixing of concrete phase? (in the case of the Construction extension database)</b>
A: No, the 2014 upgrade does not contain a mixing process like this. We however have set it on our list of possible improvements for 2015. Thank you for bringing this up!
<b>Q: Are the slides available later?</b>
A: Yes. A recording and a copy of the slides are available here <a href="http://www.gabi-software.com/overview/videos/">http://www.gabi-software.com/overview/videos/</a>
<b>Q: What is ENTSO-E in the energy table (slide 11)</b>
A: ENTSOE is the "European Network of Transmission System Operators for Electricity" and the grid mix includes more countries than the EU-27 grid mix (e.g. Switzerland and Norway).
<b>Q: How do you take into account into the grid mix, the energy/electricity purchased abroad. Like electricity purchased in France by Germany?</b>
A: Imports and exports are fully included in the electricity grid mixes. The mix type of the datasets in the documentation tab says "consumption mix", which means that the dataset models the electricity that is consumed in the country (production plus imports minus exports).
<b>Q: I thought Methane (biotic) GWP is lower than Methane (organic emissions to air)? The reason being that methane (biotic) is from renewable sources and thus has a lower GWP impact compared to methane emissions from non-renewable sources</b>
A: Both numbers are in GaBi, the higher number for biotic methane (which is the same than fossil methane) and also the lower number. According to the LCIA method you are using (with or without biogenic CO <sub>2</sub> ) you have to choose different LCIA quantities. These questions are answered more fully in the recording.
<b>Q: Can you share the JRC link for energy data review with everybody attending this webinar?</b>
A: <a href="http://bookshop.europa.eu/de/background-analysis-of-the-quality-of-the-energy-data-to-be-considered-for-the-european-reference-life-cycle-database-elcd--pbLBNA26431/">http://bookshop.europa.eu/de/background-analysis-of-the-quality-of-the-energy-data-to-be-considered-for-the-european-reference-life-cycle-database-elcd--pbLBNA26431/</a>
<b>Q: How can we create a new process and add a new data? When we add new data, there is a problem during the balance studies?</b>
A: You can add new data regarding processes and plans any time. Be careful however when creating new flows: flows for valuable substances (that you use for connecting plans and processes) are without problem. For elementary flows (that directly come from or go to the environment) you need to be careful to characterize the flow in all of the LCIA impact categories you want to have results for. As this is sometimes difficult we would advise you to get in contact with our PE deployment team and ask for PE to do it for you or give advice on which other flow you may use instead. You can reach the team on <a href="mailto:support@gabi-software.com">support@gabi-software.com</a>
<b>Q: There is problem for the evaluating of LCA of wastewater treatment plant (WWTP). the database is not sufficient for this aim</b>
A: PE is currently working on a parameterized model for a WWTP. However this is quite difficult since a WWTP is a multi-input multi-output system that lacks simple linear transmission factors between inputs and outputs (example: a "good" and clean waste water that does not contain any

"emissions" the microorganism may feed on is quite bad, because the microorganism will then die and the WWTP will stop working properly). However the model we are planning to release in the upgrade 2015 may be able to solve at least some of your problems.

**Q: Dear GaBi Team, are there any news regarding water footprint? On both inventory and impact assessment level?**

A: Water consumption (bluewater, greenwater) and water use can be assessed. The inventories, flow names, terminologies etc. in GaBi and the datasets in the food & feed database are according to ISO 14046. The underlying data for water consumption are derived from Pfister et al. The ISO 14046 also requires a spatial and time resolution. This is not yet directly possible but we can support you with any requirements with this regard.

**Q: Land Use Change: does it only regard CO2?**

A: Yes, only CO2 is regarded.

**Q: As the methodology of calculating CO2 emissions from LUC has changed, can I compare new datasets with older ones and how can I explain changes to my customer?**

A: The calculations included newly in the upgrade 2014 are based on the method described in the Envifood protocol (based on the "weighted average" as given in PAS2050-1). We choose this approach as this is required for product environmental footprint (PEF) data.

This protocol describes how to derive the attribution of land transformation to a given crop and country combination. These calculations refer to direct land use change. Indirect land use change is not included. Provision of information on indirect land use change is not required by any standard, as the scientific consensus does not yet exist and robustness of methods cannot be guaranteed (please see here

[http://www.ncsu.edu/bioresources/BioRes\\_09/BioRes\\_09\\_3\\_3755\\_Editorial\\_Finkbeiner\\_Indirect\\_Land\\_Use\\_Change\\_5597.pdf](http://www.ncsu.edu/bioresources/BioRes_09/BioRes_09_3_3755_Editorial_Finkbeiner_Indirect_Land_Use_Change_5597.pdf) for an interesting article on indirect land use change).

The methodologies and the data sources of the land use change emissions applied in the already existing databases are different and are explicitly documented. So the changes can be explained with the data sources and methodologies. For further questions please check our webinar in January or contact us directly.

**Q: Since you are also a provider of ecoinvent datasets how did ecoinvent energy data did in this review? As good as PE?**

A: For the first question we really would like that you get your own impression. The full study is available in the EU bookshop under <http://bookshop.europa.eu/de/background-analysis-of-the-quality-of-the-energy-data-to-be-considered-for-the-european-reference-life-cycle-database-elcd-pbLBNA26431/>

**Q: Can you please explain a bit further why the consequential version of ecoinvent 3.1 will not be on GaBi?**

A: For the moment the customer demand for consequential LCA is not very high, most applications and practitioners demand attributional LCA. Please mention your demand towards the PE sales persons, when the demand is high enough we certainly consider integrating it.