

Royal Decree establishing threshold levels for the emissions to the indoor environment from construction products

# Questions frequently asked by companies (FAQ)

Date: 1/12/ 2014 Version 1.2

Author: Dieter De Lathauwer, Belgium's Federal Public Service of Health

#### Disclaimer

This document is intended to be indicative and does not modify the text of the RD in any way. Only the relevant courts of justice are qualified to interpret Belgian legislation in the event of any conflict.



1.	Back	(ground	
	1.1.	What is the applicable legislation, where can I find it and in which languages?	
	1.2.	What substances are being dealt with?	
	1.3.	What issue is this decree tackling?	
	1.4.	Why not implementing the French labeling scheme instead of binding criteria?	
	1.5.	Who or what does the Belgian legislation aim to protect?	4
	1.6.	How does the Belgian law relate to the French and German legislation?	
	1.7.	Wouldn't a European approach make more sense?	
	1.8.	Is a distributor or importer obliged to establish a product emission file?	
2.	•	oe	
	2.1.	To which products does the present legislation apply?	
	2.2.	Does the RD also apply to floor repair products?	
	2.3.	Are wood-based panels (e.g. MDF and OSB) included in the scope of the RD?	7
	2.4.	Is the manufacturer responsible when the user does not follow the instructions on the label or	
		ole information sheets?	
	2.5.	Why does the legislation apply to floor coverings only and not to other emission sources?	
	2.6.	Although adhesives do not come directly in contact with indoor air, they are nonetheless include	
	in the l	RD. Why?  Are decorative paints also covered?	
	2.7.	Why is there an exception for some products in Annex 4?	
3		ing	
٥.	3.1.	When does the new legislation come into force?	
	3.2.	Why a seemingly complex transitional period?	
	3.3.	What happens with the stocks of products as from 1 <sup>st</sup> January 2015?	
4.		plex products	
	4.1.	Some floor coating systems are made up of several distinct products. Which criteria do they hav	
		et?	
	4.2.	Must each of my products be tested?	
	4.3.	Which criteria must be met by a parquet that still has to be painted?	
5.		uirements	
	5.1.	What are the obligations for the manufacturer?	. 10
	5.2.	One of my products does not comply with the criteria: what should I do?	
	5.3.	Do we have to use a logo or adapt the label?	
	5.4.	What does the R-value mean?	. 11
	5.5.	Is there a coordinated list of LCI values?	. 1:
	5.6.	Can the LCI list be modified? If so, does the law provide for a transitional period?	. 13
	5.7.	Formaldehyde shall soon be classified as being carcinogenic. Will that have an impact for the	
	presen	t legislation?	
	5.8.	Are the R-value and the VOCs defined in the RD?	. 12
	5.9.	Are carcinogens only VOCs ?	
	5.10.	What are the limit values and substances selected based on?	
6.	Proc	duct Emissions File	
	6.1.	Does a document type or example of PEF exist?	
	6.2.	Should the PEF be approved in advance by the administration?	
	6.3.	Is the PEF made public?	
	6.4.	Our products are manufactured by another company. Who draws up the PEF and who keeps it u	-
		e?	. 14
	6.5.	Point (5) of the specific documentation: how to prove the absence of modification of product	
_		teristics despite chemical reactions which do not modify the characteristics?	
7.		ing, laboratories and test methods	
	7.1.	Is it compulsory to test all products prior to placing on the market?	
	7.2.	In which laboratories can tests be carried out?	. 14





7.3.	Can we use existing test reports?	15
	Our products have been approved by the German DIBt and emissions files have been dr	
it end	ough?	15
7.5.	Which test method do we have to use?	15
7.6.	Should each product be tested or can we define groups?	15
8. Ma	arket Surveillance	16
8.1.	Will the market be monitored?	16
8.2.	What happens in case of difference between the emission results given by the manufac	turer and
the c	control measure?	16
8.3.	Which sanctions?	16

Find out more: info@environment.belgium.be



# 1. Background

## 1.1. What is the applicable legislation, where can I find it and in which languages?

The relevant legal provisions are set out in the Royal Decree of 8<sup>th</sup> May 2014 establishing threshold levels for the emissions to the indoor environment from construction products for certain intended uses, and published in the Belgian Official Gazette (Moniteur belge/Belgisch Staatsblad) of 18<sup>th</sup> August 2014.

The legal text is available in French and Dutch: <a href="http://www.ejustice.just.fgov.be/loi/loi.htm">http://www.ejustice.just.fgov.be/loi/loi.htm</a> There is no official translation in English available.

A former version can be found in all EU languages at <a href="http://ec.europa.eu/enterprise/tris/en/">http://ec.europa.eu/enterprise/tris/en/</a> using following search parameters: year "2012", number "0568" and country "Belgium".

#### 1.2. What substances are being dealt with?

De royal decree limits about 170 volatile organic compounds. This is a generic name for substances composed out of carbon, hydrogen and oxygen. Because of their volatility, they can come out of materials.

The emissions of formaldehyde, acetaldehyde and toluene also are limited.

Carcinogenic substances are no long allowed to be emitted.

## 1.3. What issue is this decree tackling?

Since several years it is acknowledged that the indoor air quality is often problematic. This has been demonstrated through various studies both in Belgium as abroad. These studies show that child care centers, schools and dwellings often exceed the reference values.

Possible consequences of such a bad air quality are loss of concentration, irritation, respiration problems and in some cases disease or cancer.

Plenty of people do not have a voice in the choice of materials (tenants, children in day care centre, meeting rooms for visitors, elderly homes, ...) and we spend more than 85% of our time indoors.

#### 1.4. Why not implementing the French labeling scheme instead of binding criteria?

The Belgian authorities consider that a classification and labeling scheme does not meet their needs for three main reasons.

Firstly, consumers do not know what is the most suitable product to use for which application. What is the health gap between A+ and A?

Secondly, a label on which classes are mentioned can lead to a differentiated price increase and, as a result, mainly affluent project owners will be able to choose healthy products, while a majority of people will not be consulted regarding the choice of construction materials to be used in places where they live for a long period of time (e.g. children in nurseries).

Finally, the activities performed should ultimately be declared by means of CE marking or a declaration of performance. Requiring manufacturers to affix a label that will be no longer necessary or should be replaced soon can create unnecessary extra costs.

#### 1.5. Who or what does the Belgian legislation aim to protect?

The Belgian law aims to give the population a minimum level of protection.

The criteria are health-related. Therefore we can say that products that meet the criteria represent an acceptable risk for society, while non-compliant products are unacceptable for society. It is not a question of saying that "the lower the emissions, the better". We should rather speak of emissions that are higher or lower than a given limit.



The criteria provide a safety factor for more vulnerable people such as children and elderly. Besides, the law has been designed to also protect those who are not consulted in choosing the construction products. Examples:

- participants in a meeting in a company that does not employ them.
- children in nurseries
- people living in rented accommodation
- residents of eldercare facilities

The protection of people using construction products for professional purposes (e.g. installers) does not belong to the field of application of the legislation. These people are protected by other legislation (Act of 4 August 1996 on well-being of workers in the performance of their work) which requires the employer to take necessary action such as wearing a mask in some cases.

These health-related criteria are included in the R parameter and are based on the work of the Joint Research Centre of the European Commission (JRC).

#### 1.6. How does the Belgian law relate to the French and German legislation?

The Belgian law is mainly based on the German legislation, but the French legislation is also adequately taken into account.

In Belgium, France and Germany, there is an almost complete ban on carcinogenic emissions. In the three countries, the method determining emissions of dangerous substances is based on the ISO 16000 standards. The Belgian law refers to the CEN/TS 16516 standard which defines a number of parameters of the ISO 16000 series more accurately in order to strengthen the accuracy, variability and robustness of the method.

In Germany and Belgium, floor covering products must comply with binding criteria. In France, you only have to affix a label on the product.

In France, all construction products are targeted, while the Belgian and German laws apply to floor covering products only.

In France, they use a class system based on ten substances. In Belgium, we assess many more substances.

#### 1.7. Wouldn't a European approach make more sense?

Polluted indoor air is not limited to Belgium. The Royal Decree is a temporary measure until a suited legislation at EU level is rolled out. The Belgian government pushed heavily for this during their presidency of the EU in 2010.

That is why the decree is taking into account the European context. The Belgian decree uses as much as possible European reference documents (limit values, test methods, construction products regulation) and aimed at as least possible barriers to trade to take care of the health of our citizens. The Belgian decree follows the existing regulation in Germany and follows the recommendations of the scientific center of the European Commission. The limit values are based on European harmonised limit values which are based on health related risk assessments.

A big part of the European industry started last years prior to the decree to modify and enhance their existing products. From 2015 on there is now a level playing field due to the decree.

Belgium remains an active actor to achieve a full harmonization of the limit values (EU-LCI) used for calculating the R-value. That is why we have sent a letter together with Germany, France and industry actors to the European Commission to continue this exercise.



#### 1.8. Is a distributor or importer obliged to establish a product emission file?

Just like the European Construction Products Regulation, the Royal Decree distinguishes three actors: the manufacturer, the importer and the distributor. A distributor is regarded being a manufacturer when he modifies the product or markets it under his own name or brand.

We list some examples all seen from the market surveillance point of view: we have found party A, based in Belgium, to market non-conforming products.

- 1. A is the manufacturer. He is responsible for the conformity and for the product emission file.
- 2. A is not the manufacturer. A is obliged through the royal decree to communicate us his supplier. This is B.
  - a. B is the manufacturer
    - i. B is located in Belgium which makes A distributor. B is responsible for the conformity of the product emission file. A and B are not allowed to market the product on the Belgian market
    - ii. B is located in the EU. A becomes distributor. B is responsible for the conformity of the product emission file. A and B are not allowed to market the product on the Belgian market
    - iii. B is located outside EU. A is therefore importer. A is responsible to make B conform to the legislation.
  - b. B is not a manufacturer, is based in Belgium and receives the products from manufacturer C. Party A is therefore distributor.
    - i. C is located in Belgium. A and B are therefore distributors. C is responsible for the conformity and for the product emission file. A, B and C are not allowed to market the product on the Belgian market.
    - ii. C is located in the EU. A and B are therefore distributors. C is responsible for the conformity and for the product emission file. A, B and C are not allowed to market the product on the Belgian market.
    - iii. C is located outside the EU. B is therefore importer. B is responsible to make C conform to the legislation.
  - c. B is not a manufacturer, is located in the EU and receives the products from manufacturer C. A is therefore always distributor.
    - C is located in the EU. A and B are not allowed to market the product in Belgium. C is responsible for the product emission file. B is the distributor and is only allowed to market conforming products.
    - ii. C is located outside the EU. B is the importer. A and B are not allowed to market the product in Belgium. C is responsible for the product emission file. B makes sure C has established the product emission file and takes all measures to make sure that the products are conforming the royal decree.

# 2. Scope

#### 2.1. To which products does the present legislation apply?

The official list of construction products and intended uses can be found in Annex 1 to the RD. We give a summary below.

The RD applies to floor covering products, adhesives for floor covering products and finishing products for wooden floor coverings.



The definition of floor covering products clearly refers to covering a subsurface with a top layer. Consequently, interlayers are not targeted<sup>1</sup>.

The intended uses for the abovementioned products are limited to indoor areas used by people. Here are a few non-exhaustive examples:

- Residential, family homes
- Services, businesses and offices (shops, hairdressers, law firms, etc.)
- Quaternary and public sector activities (hospitals, schools, early childhood services, libraries, etc.)
- Sports facilities

Products marketed for following purposes only fall outside the scope of the RD:

- Industrial use and manufacturing areas (factory hall floors, etc.)
- Laboratories
- Motor vehicle facilities (garage services, warehouses using lift trucks, etc.)
- Indoor areas not intended for people.

#### 2.2. Does the RD also apply to floor repair products?

The RD does not apply to repair products used locally on a limited surface which is a portion of the total area (such as cracks or holes).

On the other hand, products used as a new top layer on the whole surface are governed by the RD.

#### 2.3. Are wood-based panels (e.g. MDF and OSB) included in the scope of the RD?

Wood-based panel products like MDF or OSB that are not used or marketed as a top layer or top coat do not fall under the RD. As far as we know, most panels would be used as an interlayer on which top coats such as textile or laminate are placed.

For the sake of clarity, the competent public authority recommends to clearly mention it in the product descriptions for the general public. If the manufacturer suggests that the panel product can also be used as a top layer or top coat, the product should comply with the requirements and can be subject to market surveillance by the relevant authorities.

# 2.4. Is the manufacturer responsible when the user does not follow the instructions on the label or available information sheets?

If products that have not been obviously marketed as floor covering products are still used for floor covering purposes by an architect or a project owner, the architect or project owner is responsible. In such circumstances, products may not comply with the requirements of the RD.

### 2.5. Why does the legislation apply to floor coverings only and not to other emission sources?

Floor coverings are not the only source of harmful emissions into indoor air. Other potential sources range from wall and ceiling coverings, furniture and curtains to pets, residents' exhaled breath and introduced outside air, cleaning products and open fires. Therefore ventilating is still important. We employ a step-by-step approach to deal with these emission sources. We first focus on large surfaces in direct contact with indoor air.

In 2014 and 2015 we will carry out a market research to examine if we can extend the scope to wall and ceiling covering products.

At the same time, we will work on actions regarding detergents and air fresheners.

<sup>&</sup>lt;sup>1</sup> Unless supplied in kit form.



# 2.6. Although adhesives do not come directly in contact with indoor air, they are nonetheless included in the RD. Why?

As the combination of floor coverings and adhesive materials is usually not marketed in kit form, the requirements set out in the RD must be met by the adhesive and the floor covering separately (and not by a combination of both).

In addition, emissions may escape from seams and ends, and we do not know if they are released proportionally from reduced surfaces. Because there is a real risk that those emissions can be released only later in time, the legislator decided, in consultation with the sector, to assess both separately.

## 2.7. Are decorative paints also covered?

Yes, decorative paints fall within the scope of the RD.

#### 2.8. Why is there an exception for some products in Annex 4?

The exception relates to the obligation of drafting a product emissions file. The products in question still must fulfill the emissions criteria in any case.

Those products are inert and/or heated to very high temperatures, thus preventing any additional emissions from organic substances:

- glass (not all types)
- ceramic floor tiles
- steel
- natural stone

If such materials are used along with others, the exemption is no longer valid.

A hypothetical example is a glass mosaic floor system with bed and glass both provided by the manufacturer.

#### 3. Timing

## 3.1. When does the new legislation come into force?

There are three possible scenarios.

Products are placed/made available on the market

- before 1<sup>st</sup> September 2014: those products may be made available on the market till 1<sup>st</sup>
   September 2015 (transitional period);
- between 1<sup>st</sup> September 2014 and 1<sup>st</sup> January 2015: as from 1<sup>st</sup> January 2015 it is prohibited to make these products available on the market if they do not meet the requirements referred to in Annex 2;
- after 1<sup>st</sup> January 2015: construction products that do not meet the requirements set out in Annex 2 may not be placed/made available on the market.

The placement and making available on the market are defined in the Construction Products Regulation 305/2011:

- "making available on the market" means any supply of a construction product for distribution or
  use on the Union market in the course of a commercial activity, whether in return for payment or
  free of charge;
- "placing on the market" means the first making available of a construction product on the Union market.



Example: <u>Paint cans</u> sold in stores before  $1^{st}$  September 2014 can still be sold until  $1^{st}$  September 2015. Paint cans placed on the market between  $1^{st}$  September 2014 and  $1^{st}$  January 2015 can still be sold until  $1^{st}$  January 2015.

# 3.2. Why a seemingly complex transitional period?

The several dates and transitional periods seem complex because the RD has been published later than expected. The RD was supposed to be signed and published at end 2013. With this in mind, the provisions of the RD make much more sense. For more detailed information, please see below.

The aim was to publish the RD at the end of 2013, but that was not possible owing to unexpected delays in signing the RD and in the Publications Service of the Belgian Official Gazette (due tonational elections). The final version was ready to be signed in September 2013. In early May 2014, the RD was signed by all the ministers in charge and the King of Belgium . It was then published in the Belgian Official Gazette of 18<sup>th</sup> August 2014.

We have deliberately chosen not to make the start of the transitional period coincide with the date of entry into force of the RD (i.e. 1<sup>st</sup> January 2015). Publishing the RD at the end of 2013 would have resulted in a 2-year transitional period, which was unacceptable for us in terms of health effects as the notification to the EC already dates back as far as 2012.

By implementing a longer transitional period of time, we prevented all products placed on the market <u>before</u> the official publication of the RD from being immediately withdrawn from the market. It would have been an example of ineffective management if we had required manufacturers to immediately withdraw products from the market while there was no requirement yet by the time they were placed on the market.

The step-by-step approach is the result of extensive prior consultations with the sector and relevant advisory bodies. Indeed the content of the RD has been made public since 2011 and the technical criteria have not been amended.

The RD was concretely discussed for the first time in November 2010. In 2011, the following advisory bodies were consulted: the Central Economic Council, the Superior Health Council, the Consumer Council and the Federal Council for Sustainable Development. In 2012 the draft RD was notified to the European Commission and the text was made available in all Member States. The date of entry into force as mentioned in that version was 1<sup>st</sup> January 2014. Every product placed on the market should comply with the legal requirements from that date.

#### 3.3. What happens with the stocks of products as from 1<sup>st</sup> January 2015?

Only compliant products may be marketed. Non-compliant products may no longer be put on the market.



# 4. Complex products

# 4.1. Some floor coating systems are made up of several distinct products. Which criteria do they have to meet?

Coatings and screeds e.g. are composed of several elements and layers. The kit must fulfill the requirements of the RD.

A kit includes construction products placed on the market by one manufacturer as a package consisting of at least two separate elements that need to be combined in the construction work.

#### Example

A paint system with three essential components (1 primer + 2 top layers) which are put on the market by one manufacturer. In that case, the whole (1 primer + 2 top layers) must comply with the requirements.

#### 4.2. Must each of my products be tested?

Each product of the range must be covered. You do not always need to check all combinations. It may be sufficient to split the range of products and combinations into subgroups, to define a worst-case combination per subgroup and to test it.

The splitting in subgroups and the definition of worst-case products must be duly documented and reasoned.

#### 4.3. Which criteria must be met by a parquet that still has to be painted?

There are two possibilities.

The first one is that the parquet manufacturer paints the parquet by himself in his plant (or by subcontracting the job). He then places a painted product on the market and he is responsible for it. The combination of parquet and paint should comply with the requirements.

The second possibility is that the parquet gets painted after being installed on the construction site. Here we can have two scenarios:

Either the parquet and the paint are not supplied as a kit (see above). The parquet floor is painted by a party that has no contractual relation with the manufacturer. The manufacturer does not interfere in choosing the paint. Here both products must be compliant separately.

Or the parquet and the paint are supplied as a kit. The manufacturer and supplier of the parquet can also supply the paint. Here the kit as a whole must comply.

## 5. Requirements

#### 5.1. What are the obligations for the manufacturer?

There are two essential requirements:

Firstly, the product emissions must meet the criteria set out in Annex 2.

Secondly, the manufacturer must compile a product emissions file.

In addition, the manufacturer also has process requirements to fulfill:

There must be a traceability between each product on the market and the product type on which the product emissions file is based.



The manufacturer also ensures that procedures shall be put into place in order to maintain the indicated achievements for serial production. Appropriate consideration must be given to changes in product type and harmonized technical specifications.

The manufacturer investigates complaints, non-conforming products and recalled products, keeps a register thereof and keeps the distributors informed about such supervision. To this end, the manufacturer shall draft a procedure.

#### 5.2. One of my products does not comply with the criteria: what should I do?

There are several possibilities such as adapting the formulation or manufacturing process, withdrawing the product from the Belgian market, etc. If the product is found not to be compliant after 28 days, you can check when it will be compliant, and you can extend the storage time with the same period of time.

It is prohibited to give those products away free of charge.

Please contact the competent public service (who?) to raise the issue if need be.

#### 5.3. Do we have to use a logo or adapt the label?

No. You do not have to use a logo, nor do you have to add any information to the label.

#### 5.4. What does the R-value mean?

The R-value compares each emitted substance with its individual LCI value (i.e. the health-related criterion).

Please refer to following documents for further information:

- JRC ECA report No 29 LCI harmonization framework
   <a href="http://ihcp.jrc.ec.europa.eu/our activities/public-health/indoor air quality/eca/jrc-published-harmonisation-framework-health-based-evaluation-emissions">http://ihcp.jrc.ec.europa.eu/our activities/public-health/indoor air quality/eca/jrc-published-harmonisation-framework-health-based-evaluation-emissions</a>
- JRC ECA report No 24 Harmonization of emissions labeling systems <a href="http://ihcp.jrc.ec.europa.eu/our activities/public-health/indoor air quality/eca/eca report 24">http://ihcp.jrc.ec.europa.eu/our activities/public-health/indoor air quality/eca/eca report 24</a>
- JRC ECA report No 18 Emissions from building products <a href="http://ihcp.jrc.ec.europa.eu/our activities/public-health/indoor air quality/eca/eca report 18">http://ihcp.jrc.ec.europa.eu/our activities/public-health/indoor air quality/eca/eca report 18</a>
- AgBB protocol (Germany)
   http://www.umweltbundesamt.de/themen/gesundheit/kommissionen-arbeitsgruppen/ausschuss-zur-gesundheitlichen-bewertung-von

#### 5.5. Is there a coordinated list of LCI values?

Yes.

#### 5.6. Can the LCI list be modified? If so, does the law provide for a transitional period?

The EU LCI master list (see JRC ECA Report No 29) presently includes a total of 177 compounds, 82 of which with agreed interim EU-LCI values and 95 "with derivation pending".

As regards the 95 compounds with pending derivation, the RD stipulates that the notified LCI values of AgBB valid at the time the product is placed or made available on the market, apply The version of July 2013 applies for the time being.

The intent is to refer, whenever possible, to harmonized EU limit values.

If a listed substance moves from a "with derivation pending" status to an "agreed interim EU-LCI value" status, or changes as an "agreed interim EU-LCI value", there are two potential scenarios:

1) The new value is even or less stringent than the previous one. Then there is no problem.



2) The new value is more stringent than the previous one. For the time being, no transitional measures are provided for.

Similarly, should a new substance be added to the EU LCI list, no transitional measure is provided for at this time. We will examine in due course whether a pragmatic solution can be found in order to prevent additional tests from being compulsory overnight without prior notice.

# 5.7. Formaldehyde shall soon be classified as being carcinogenic. Will that have an impact for the present legislation?

The re-classification of formaldehyde can have an impact but we do not know which one exactly. As the potential consequences will extend outside the Belgian borders, we will first have to consult thoroughly with other EU Member States, the industry and other stakeholders.

The existing formaldehyde emission standard ( $< 100 \,\mu g/m^3$ ) continues to apply for the time being.

#### 5.8. Are the R-value and the VOCs defined in the RD?

Annex 2 refers to the definitions in the Technical Specification CEN/TS 16516. These definitions apply.

#### 5.9. Are carcinogens only VOCs?

The criterion targets all carcinogens but faces practical limits due to the test method referred to. In other words, it applies to carcinogens which can be detected by using the test method, i.e. VOCs only (including VVOC, etc.). Maybe we will extend it in the future, but not in the first few years.

#### 5.10. What are the limit values and substances selected based on?

The selection of substances and limit values is based on the French and German legislation as well as on studies by the Directorate-General Joint Research Centre (JRC) of the European Commission. The DG JRC developed a first set of harmonized limit values called EU-LCI values. They are based on scientific risk analyses and are directly related to health effects. The Belgian RD follows those EU harmonized LCI values.

The Belgian Federal Government did not only address the issue at EU level but also consulted with the regional authorities. For example, the Flemish Indoor Environment Decree of 2004 sets out a series of guide and intervention values.

The Royal Decree takes these values into account and, by doing so, contributes to achieving the objectives of the Regions, especially regarding toluene, formaldehyde and TVOC. As far as TVOC are concerned, the Flemish Indoor Environment Decree (IED) provides for a guide value of  $200 \, \mu g/m^3$ . With a view to helping the industry implement the new regulations and to complying with the German legal provisions, we have decided to maintain a value of  $1000 \, \mu g/m^3$ . As regards formaldehyde, the limit value is the one recommended by the World Health Organization.

#### Order of magnitude of limit values

Please find below a quick comparison between Belgium, France and Germany as well as other references (such as private labels, the Flemish IED, etc.). Please note that the criteria can certainly not be considered stringent, especially in terms of TVOC.

Limit values should be measured after 28 days and an extra curing time often applies to liquids. As already said, the R-value is based on EU harmonized limit values which, in turn, are based on health effects risk analyses.

The R-value is also used in Germany to assess floor covering products.



Floor Covering Products and adhesives	Belgium	Germany	France
R-value	Max. 1	Max 1	N/A
TVOC	Max 1000	Max 1000	Equivalent to class A+
TSVOC	Max 100	Max 100	-
Cancer-causing emissions	Not authorized	Not authorized	Not authorized
Acetaldehyde	Max 200	-	Equivalent to class A+
Toluene	Max 300	Within R-value	Equivalent to class A+
Formaldehyde	Max 100	Max 120	Class B < 120 Class A < 60

Flemish IED	Superior Health Council
-	Max 1
Maximum guide	Max 330
value of 200	to 600
-	No statement made
-	Not authorize d
	Max 200
Guide value of 260	Max 300
Intervention value	
of 100	Max 30
Guide value of 10	

Mandatory labeling	No	No	Yes
Reference test method	CEN/TS 16516	ISO 16000/ CEN/TS 16516	ISO 16000/ CEN/TS 16516

# 6. Product Emissions File

# 6.1. Does a document type or example of PEF exist?

No. All you need to know can be found in Annex 3.

## 6.2. Should the PEF be approved in advance by the administration?

You do not have to apply for approval by the administration (who?). Yet the PEF must be available at any time to the supervisory authority (who?).

# 6.3. Is the PEF made public?

There is no requirement to share the results or the PEF.

From a business perspective, we are of the opinion that the client, at his request, should be given a document proving that the product complies with the limit values and with other provisions of the RD and that the manufacturer has an in-house file.



# 6.4. Our products are manufactured by another company. Who draws up the PEF and who keeps it up-to-date?

There are several possibilities:

- (1) products you manufacture by yourself with your own label
- (2) products which are manufactured by a third party, but with your own label
- (3) products which are manufactured by a third party, with a label that is the property of a third party.
- (4) products you manufacture yourself, but on which another party puts his own label.

According to the EU Regulation, "manufacturer" means any natural or legal person who manufactures a construction product or who has such a product designed or manufactured, and markets that product under his name or trademark.

Consequently, you have to draw up a file and to keep it up-to-date in (1) and (2). The manufacturer keeps the whole physical file up-to-date and is responsible for its content. In (3) and (4) the third party is responsible.

The person or company that imports a product from a non-EU country into Belgium keeps a copy of the physical file. If the file contains confidential information from the manufacturer, the importer makes sure that the confidential information is identified and mentioned as such in his copy of the file. He also ensures that the manufacturer delivers the confidential information to the competent authorities upon request.

# 6.5. Point (5) of the specific documentation: how to prove the absence of modification of product characteristics despite chemical reactions which do not modify the characteristics?

Is it necessary for the manufacturer to always test the compound product? There may be products on the market of which several components do not undergo any chemical reaction. The manufacturer can then evaluate the components separately and the sum of the components, instead of testing the whole compound.

A hypothetical example is a PVC window profile, with glass, kit and steel-reinforced panels. The emissions profile of the window could be considered as the sum of the separate components being tested separately by the respective manufacturer, instead of testing the whole window.

# 7. Testing, laboratories and test methods

#### 7.1. Is it compulsory to test all products prior to placing on the market?

No. Testing is not compulsory and does not have to be performed in certified laboratories. However, you must be able to prove that your products are compliant with Annex 2, e.g. by combining existing data, alternative tests and correlations.

#### 7.2. In which laboratories can tests be carried out?

You are free to choose. It can be in Belgium or abroad. You are also allowed to perform the tests by yourself.



It should be noted, however, that the market surveillance process requires using the reference test method applicable and the public authorities have committed themselves to working with certified laboratories.

#### 7.3. Can we use existing test reports?

It is not imperative to perform all tests again for Belgium. The method set out in the RD is the reference test method and not the mandatory method. In other words, a test carried out by the public authorities complies with the reference test method. Therefore the PEF is important as it enables you to justify and document the reasons why existing test reports, such as in the AgBB protocol, or alternative test reports would be sufficient to meet the requirements (including the reference test).

The justification must be thoroughly done. Here are a few points you should focus on: Are all products of the range covered? How? Has the product (or its composition) remained identical throughout the years or has it changed? Does the changing composition have an impact on the emissions? Have you performed an alternative or quick test that does not suggest any new suspicions? Have new substances been added to the LCI list in the meantime, but the R-value is already low and you only performed a new TVOC test, the results of which have also decreased sharply? Etc.

# 7.4. Our products have been approved by the German DIBt and emissions files have been drawn up. Is it enough?

There is a difference between emissions files and testing, as test reports are part of the emissions file. Annex 3 to the RD defines the requirements the PEF should meet both in form and content. However, we do not have any idea as to the content and form of DIBt emissions files.

It is nevertheless true that the limit values in the RD are based on the DIBt and AgBB values (R-value, TVOC, SVOC, formaldehyde, carcinogens, etc.). No new or extra tests should therefore be carried out in many cases. The manufacturer is responsible for checking it.

For Belgium, existing test reports can be used.

See also above.

#### 7.5. Which test method do we have to use?

We have left that open to the manufacturer. The reference test method (e.g. used for market surveillance) is the one laid down in Annex 2.

#### 7.6. Should each product be tested or can we define groups?

The manufacturer has the possibility to define groups and to determine worst cases. He needs to motivate his group definition and his worst case determination.



### 8. Market Surveillance

#### 8.1. Will the market be monitored?

Yes, there will be a market surveillance. The Inspection Service of the FPS of Health is empowered to carry out such checks. Requesting emissions files and taking samples are examples of what the inspectors are entitled to do.

General provisions on inspections are set out in the Royal Decree of 2<sup>nd</sup> July 2014 which lays down the rules for the implementation of checks on compliance with the Product Standards Act of 21<sup>st</sup> December 1998 (in French: *Arrêté royal du 2 juillet 2014 organisant l'exécution des contrôles de l'application de la loi du 21 décembre 1998 relative aux normes de produits ayant pour but la promotion de modes de production et de consommation durables et la protection de l'environnement, de la santé et des travailleurs*, published in the Belgian Official Gazette of 14<sup>th</sup> August 2014).

# 8.2. What happens in case of difference between the emission results given by the manufacturer and the control measure?

A result from an accredited laboratory having executed the reference test method is hardly disputable. First of all the emission dossier will be investigated and information will be requested (was it a one off, was there a batch problem, what are the FPC results, etc.). Our Inspection Service will also take a second test sample which can be analyzed.

#### 8.3. Which sanctions?

Non-conforming products have to be eliminated from the Belgium market or made compliant. Ranges of administrative fines are set in the Royal Decree of July 2<sup>nd</sup>, 2014 regarding the law of december 21<sup>st</sup>, 1998.

Costs for non-conforming tests during market surveillance are forwarded to the manufacturer.

--