



## 2.B.6 - Titanium Dioxide Production

### Short description

| Category Code | Method          |                 |                 |       |     | AD |    |    |    |      | EF  |     |     |                  |                   |
|---------------|-----------------|-----------------|-----------------|-------|-----|----|----|----|----|------|-----|-----|-----|------------------|-------------------|
| 2.B.6         | T3              |                 |                 |       |     | C  |    |    |    |      | C   |     |     |                  |                   |
| Key Category  | SO <sub>2</sub> | NO <sub>x</sub> | NH <sub>3</sub> | NMVOC | CO  | BC | Pb | Hg | Cd | Diox | PAH | HCb | TSP | PM <sub>10</sub> | PM <sub>2.5</sub> |
| 2.B.6         | -/-             | -/-             | -               | -     | -/- | -  | -  | -  | -  | -    | -   | -   | -/- | -                | -                 |

**T** = key source by Trend **L** = key source by Level

| Methods   |                                 |
|-----------|---------------------------------|
| <b>D</b>  | Default                         |
| <b>T1</b> | Tier 1 / Simple Methodology *   |
| <b>T2</b> | Tier 2*                         |
| <b>T3</b> | Tier 3 / Detailed Methodology * |
| <b>C</b>  | CORINAIR                        |
| <b>CS</b> | Country Specific                |
| <b>M</b>  | Model                           |

\* as described in the EMEP/EEA Emission Inventory Guidebook - 2019, in the group specific chapters.

| AD - Data Source for Activity Data |                                      |
|------------------------------------|--------------------------------------|
| <b>NS</b>                          | National Statistics                  |
| <b>RS</b>                          | Regional Statistics                  |
| <b>IS</b>                          | International Statistics             |
| <b>PS</b>                          | Plant Specific data                  |
| <b>As</b>                          | Associations, business organisations |
| <b>Q</b>                           | specific Questionnaires (or surveys) |
| <b>M</b>                           | Model / Modelled                     |
| <b>C</b>                           | Confidential                         |
| EF - Emission Factors              |                                      |
| <b>D</b>                           | Default (EMEP Guidebook)             |
| <b>C</b>                           | Confidential                         |
| <b>CS</b>                          | Country Specific                     |
| <b>PS</b>                          | Plant Specific data                  |
| <b>M</b>                           | Model / Modelled                     |

In *NFR 2.B.6*, SO<sub>2</sub>,CO,NO<sub>x</sub> and TSP emissions from the production of titanium dioxide are reported.

### Method

#### Activity Data

For the **production of titanium dioxide**, the producers report the sum of all SO<sub>2</sub>-emissions. As these emissions are confidential, they are included in the respective emissions reported for **sulphuric acid production**.

## Emission Factors

Due to confidentiality concerns, this data is not made public.

## Recalculations

For SO<sub>2</sub> emissions from the production of **titanium dioxide** and **sulphuric acid**, estimates reported for the *second to last year* of the time series are routinely actualised by the producers. Furthermore, definite emissions for the *last year of the time series* are not yet available at the time the inventory is compiled. Here, the reported values represent a prediction and are therefore updated with each new submission as well.

Because of technical problems with the data transfer, there is a small recalculation for titanium dioxide production for 2015 and 2016.



For pollutant-specific information on recalculated emission estimates for Base Year and 2018, please see the pollutant specific recalculation tables following [chapter 8.1 - Recalculations](#).

## Planned improvements

In the NEC Review Germany was requested to calculate emissions of NO<sub>x</sub>, CO and TSP from titanium dioxide production. Germany tries to collect the data needed to calculate these emissions.

For the Key Category Analyses the emissions of SO<sub>x</sub> from TiO<sub>2</sub> production are wrongly allocated to 2B10a. Germany plans to reallocate these emissions in the next submission back to TiO<sub>2</sub>.