

Hungarian completed responses to the 2010 Strategies and Policies questionnaire relating to the Gothenburg Protocol

Question 40: With reference to article 3, paragraph 2, and annex IV, paragraph 9, specify the limit values for sulphur emissions applied to each new stationary source (construction or substantial modification commenced after 17 May 2006) in your country within stationary source categories identified in that annex. If you have applied alternative emission reduction strategies, please go to question 49. Please complete the table below.

Table 19: Question 40

Stationary source category ^{1/}	O ₂ in flue gas (%)	Limit value ^{2/} (mg/Nm ³)	Alternative: Desulphurization rate for domestic solid fuel	National legislation
1. Solid and liquid fuels 50-100 MW _{th}	solid: 6, liquid: 3	850, biomass: 200	Min 92% or 300 mg/Nm ³	Ministerial Decree 10/2003. (VII. 11.) KvVM
2. Solid and liquid fuels 100-300 MW _{th}	solid: 6, liquid: 3	solid fuel: 200, liquid fuel: 400-200 with linear decrease	Min 92% or 300 mg/Nm ³	Ministerial Decree 10/2003. (VII. 11.) KvVM
3. Solid and liquid fuels >300 MW _{th}	solid: 6, liquid: 3	200	Min 95% or 400 mg/Nm ³	Ministerial Decree 10/2003. (VII. 11.) KvVM
4. Gaseous fuels	3	35	n.a.	Ministerial Decree 10/2003. (VII. 11.) KvVM
5. Liquified gas	3	5	n.a.	Ministerial Decree 10/2003. (VII. 11.) KvVM
6. Low-calorific-value gases (e.g. gasification of refinery residues or combustion of coke oven gas)	3	400	-	Ministerial Decree 10/2003. (VII. 11.) KvVM
7. Blast furnace gas	3	200	n.a.	Ministerial Decree 10/2003. (VII. 11.) KvVM
8. Combustion plant in refineries >50 MW _{th} total refinery capacity (average of all new installations)	solid: 6, liquid: 3	600	n.a.	Harmonization of the 2010/75/EU Directive is in progress

1/ For new stationary source, see [article 1](#) (Definitions); for further information on stationary source categories see [annex IV](#) (paras. 9–12).

2/ Different limit values for different types of fuels may be provided, e.g. biomass, peat, etc.

Question 41: With reference to [article 3, paragraph 3](#) and [annex IV, paragraph 9](#), please provide details of the limit values for sulphur emissions applied in your country to each existing stationary source (construction commenced on or before 17 May 2006) within a stationary source category identified in that annex, in so far as it is technically and economically feasible and taking into consideration the costs and advantages. If you have applied alternative emission reduction strategies, please go to question 49. Please complete the table below.

Table 20: Question 41

Stationary source category ^{1/}	O ₂ in flue gas (%)	Limit value ^{2/} (mg/Nm ³)	Alternative: Desulphurization rate for domestic solid fuel (%)	National legislation
1. Solid fuels 50-100 MW _{th} ^{1/}	6	2000	Min 60%	Ministerial Decree 10/2003. (VII. 11.) KvVM
2. Solid fuels 100-500 MW _{th} ^{2/}	6	2000-400 with linear decrease	100-300 MW _{th} : min 75%, 300-500 MW _{th} : min 90%	Ministerial Decree 10/2003. (VII. 11.) KvVM
3. Solid fuels >500 MW _{th}	6	400	Min 94%	Ministerial Decree 10/2003. (VII. 11.) KvVM
4. Liquid fuels 50-300 MW _{th}	3	1700	n.a.	Ministerial Decree 10/2003. (VII. 11.) KvVM
5. Liquid fuels 300-500 MW _{th}	3	1700-400 with linear decrease	n.a.	Ministerial Decree 10/2003. (VII. 11.) KvVM
6. Liquid fuels >500 MW _{th}	3	400	n.a.	Ministerial Decree 10/2003. (VII. 11.) KvVM
7. Gaseous fuels	3	35	n.a.	Ministerial Decree 10/2003. (VII. 11.) KvVM

8. Liquefied gas	3	5	n.a.	Ministerial Decree 10/2003. (VII. 11.) KvVM
9. Low-calorific-value gases (e.g. gasification of refinery residues or combustion of coke oven gas)	3	800	n.a.	Ministerial Decree 10/2003. (VII. 11.) KvVM
10. Blast furnace gas	3	800	n.a.	Ministerial Decree 10/2003. (VII. 11.) KvVM
11. Combustion plant in refineries (average of all existing installations)	solid: 6, liquid: 3	1000	n.a.	Harmonization of the 2010/75/EU Directive is in progress

1/ If you apply, as an alternative, a desulphurization rate, the category should be 50–150 MW_{th}.

2/ If you apply, as an alternative, a desulphurization rate, the category should be 150–500 MW_{th}.

Question 44: With reference to article 3, paragraph 2 and annex V, please provide details of the limit values for NO_x emissions applied to each new stationary source (construction or substantial modification commenced after 17 May 2006) within stationary source categories identified in that annex. If you have applied alternative emission reduction strategies, please go to question 49. Please complete the table below.

Table 21: Question 44

Stationary source category	Limit value (mg/Nm ³)	National legislation
A. Boilers		
1. Solid fuels 50-100 MW _{th}	400, lignite: 300, fluid-fired boilers: 200	Ministerial Decree 10/2003. (VII. 11.) KvVM
2. Solid fuels 100-300 MW _{th}	200, biomass: 300	Ministerial Decree 10/2003. (VII. 11.) KvVM
3. Solid fuels >300 MW _{th}	200	Ministerial Decree 10/2003. (VII. 11.) KvVM
4. Liquid fuels 50-100 MW _{th}	400	Ministerial Decree 10/2003. (VII. 11.) KvVM
5. Liquid fuels 100-300 MW _{th}	200	Ministerial Decree 10/2003. (VII. 11.) KvVM
6. Liquid fuels >300 MW _{th}	200	Ministerial Decree 10/2003. (VII. 11.) KvVM

7. Natural gas 50-300 MW _{th}	150	Ministerial Decree 10/2003. (VII. 11.) KvVM
8. Natural gas >300 MW _{th}	100	Ministerial Decree 10/2003. (VII. 11.) KvVM
9. Other gases	200	Ministerial Decree 10/2003. (VII. 11.) KvVM
B. Onshore combustion turbines >50 MW_{th}		
1. Natural gas	50	Ministerial Decree 10/2003. (VII. 11.) KvVM
2. Liquid fuels	120	Ministerial Decree 10/2003. (VII. 11.) KvVM
C. Cement production		
1. Dry kilns	800	Ministerial Decree 4/2011. (I. 14.) VM
2. Other kilns	800	Ministerial Decree 4/2011. (I. 14.) VM
D. Stationary engines		
1. Spark ignition engines, 4-stroke, >1 MW _{th} : Lean-burn engines	800	Ministerial Decree 4/2011. (I. 14.) VM
2. All other spark-ignition engines	800	Ministerial Decree 4/2011. (I. 14.) VM
3. Compression ignition (=Diesel) engines, >5 MW _{th} : natural gas (jet ignition engines)	800	Ministerial Decree 32/1993. (XII. 23.) KTM
4. Compression ignition (=Diesel) engines, >5 MW _{th} : heavy fuel oil	2000	Ministerial Decree 4/2011. (I. 14.) VM
5. Compression ignition (=Diesel) engines, >5 MW _{th} : diesel oil or gas oil	2000	Ministerial Decree 4/2011. (I. 14.) VM
E. Sinter plants	400	Ministerial Decree 4/2011. (I. 14.) VM
F. Nitric acid production, excl. acid concentration units	350	Ministerial Decree 4/2011. (I. 14.) VM

Question 45: With reference to article 3, paragraph 3, and annex V, please provide details of the limit values for NO_x emissions applied in your country to each existing stationary source (construction commenced on or before 17 May 2006) within a stationary source category identified in that annex, in so far as it is technically and economically feasible and taking into consideration the costs and advantages. If you have applied alternative emission reduction strategies, please go to question 49. Please complete the table below.

Table 22: Question 45

Stationary source category	Limit value (mg /Nm³)	National legislation
A. Boilers		
1. Solid fuels 50-100 MWth	600	Ministerial Decree 10/2003. (VII. 11.) KvVM
2. Solid fuels 100-300 MWth	600	Ministerial Decree 10/2003. (VII. 11.) KvVM
3. Solid fuels >300 MWth	300-500MW _{th} :600 ≥500MW _{th} :500	Ministerial Decree 10/2003. (VII. 11.) KvVM
4. Liquid fuels 50-100 MWth	450	Ministerial Decree 10/2003. (VII. 11.) KvVM
5. Liquid fuels 100-300 MWth	450	Ministerial Decree 10/2003. (VII. 11.) KvVM
6. Liquid fuels>300 MWth	300- 500MW _{th} :450, ≥ 500 MW _{th} : 400	Ministerial Decree 10/2003. (VII. 11.) KvVM
7. Natural gas 50-300 MWth	300	Ministerial Decree 10/2003. (VII. 11.) KvVM
8. Natural gas >300 MWth	300- 500MW _{th} :300, ≥ 500 MW _{th} : 200	Ministerial Decree 10/2003. (VII. 11.) KvVM
9. Other gases	50-500 MWth: 300 ≥ 500 MW _{th} : 200	Ministerial Decree 10/2003. (VII. 11.) KvVM
B. Onshore combustion turbines >50Mwth		
1. Natural gas	50-300 MW _{th} :150 ≥ 300 MW _{th} : 90	Ministerial Decree 10/2003. (VII. 11.) KvVM
2. Liquid fuels	50-300 MW _{th} :200 ≥ 300 MW _{th} : 170	Ministerial Decree 10/2003. (VII. 11.) KvVM
C. Cement production		
1. Dry kilns	800	Ministerial Decree 4/2011. (I. 14.) VM

2. Other kilns	800	Ministerial Decree 4/2011. (I. 14.) VM
D. Sinter plants	400	Ministerial Decree 4/2011. (I. 14.) VM
E. Nitric acid production, excl. acid concentration units	350	Ministerial Decree 4/2011. (I. 14.) VM

Question 46: With reference to article 3, paragraphs 2 and 3, and annex VI, please provide details of the limit values for VOCs emissions applied in your country to new stationary sources (construction or substantial modification commenced after 17 May 2006) for the stationary source category defined in table I of that annex and to existing stationary sources (construction commenced on or before 17 May 2006), in so far as it is technically and economically feasible and taking into consideration the costs and advantages. If you have applied alternative emission reduction strategies, please go to question 49. Please complete the table below.

Table 23: Question 46

Source category	Limit value (g VOCs/Nm ³)	National legislation
Storage and distribution of petrol, excluding loading of seagoing ships: Vapour recovery unit serving storage and distribution facilities at refinery tank farms or terminals with petrol throughput of 5000 m ³ annually		The regulation 9/1995. (VIII.31.) KTM Ministerial Decree <i>on hydrocarbon emission control resulting from the storage, loading, transportation and off-loading of petrol</i> , covers every stage of storage and distribution of petrol as storage at terminals, loading and unloading of mobile containers, loading into storage installations at service stations, covering even Stage II Vapour Recovery with automobile refuelling at service stations.