

Recalculations - Copper (Cu)

The marginally small changes within the **1990 National Total (+0.005 t or +0.001 %)** result from a variety of revisions throughout NFRS 1, 2 and 5 - with the strongest percental change occurring in **NFR 1.A.3.a i(i) with minus 62 %**.

Table 1: Changes in emission estimates for 1990

NFR Sector	Submission 2023	Submission 2024	Difference		Reasoning
	[t]		absolute	relative	see description and reasoning in:
NATIONAL TOTAL	619,879	619,883	0,005	0,001%	sub-category chapters
NFR 1 - Energy	538,009	538,015	0,006	0,001%	sub-category chapters
1.A.2.g vii	0,007	0,005	-0,002	-28,8%	here
1.A.3.a i(i)	0,000002	0,000001	-0,000001	-62,4%	here
1.A.3.a ii(i)	0,000025	0,000027	0,000002	7,61%	here
1.A.3.c	95,160	95,166	0,006	0,01%	here
1.A.4.a ii	0,0010	0,0009	-0,0001	-12,7%	here
1.A.4.c ii	1,1129	1,1149	0,0020	0,18%	here
NFR 2 - IPPU	81,802	81,805	0,003	0,003%	sub-category chapters
2.G	36,268	36,271	0,003	0,01%	here
NFR 3 - Agriculture	0,00	0,00	0,00		
NFR 5 - Waste	0,067	0,063	-0,004	-5,88%	sub-category chapters
5.E	0,067	0,063	-0,004	-5,88%	here
NFR 6 - Other	0,00	0,00	0,00		

The changes in the **National Total** reported for **2020 (+5.13 t and +1 %)** are dominated by opposing revisions in **NFRs 1.A.3.b vi (-1.52 t) and 1.A.3.c (+6.77 t)** where annual mileage and, hence, abrasive emissions were revised for 2020.

The significant percental change occurring in NFR 1.A.3.b iii results from a data error that will be corrected with the next annual submission.

Table 2: Changes of emission estimates for 2020

NFR Sector	Submission 2022	Submission 2023	Difference		Reasoning
	[t]		absolute	relative	see description and reasoning in:
NATIONAL TOTAL	524,59	529,72	5,13	0,98%	sub-category chapters
NFR 1 - Energy	469,12	474,36	5,24	1,12%	sub-category chapters
1.A.1.a	5,85	5,81	-0,04	-0,67%	here
1.A.1.b	3,84	3,73	-0,10	-2,72%	here
1.A.1.c	0,058	0,054	-0,004	-7,46%	here
1.A.2.g vii	0,0067	0,0069	0,0002	2,41%	here
1.A.2.g viii	0,30	0,37	0,06	21,11%	here
1.A.3.a i(i)	0,0000000991	0,0000000987	-0,0000000004	-0,42%	here
1.A.3.a ii(i)	0,000002560	0,000002561	0,000000001	0,03%	here
1.A.3.b i	0,1414	0,1420	0,0006	0,39%	here
1.A.3.b ii	0,0214	0,0218	0,0005	2,17%	here
1.A.3.b iii	0,0839	0,0286	-0,0553	-65,91%	here
1.A.3.b iv	0,00196	0,00198	0,00002	1,11%	here
1.A.3.b vi	358,94	357,42	-1,52	-0,42%	here
1.A.3.b vii	0,03433	0,03432	-0,00002	-0,05%	here
1.A.3.c	94,17	100,94	6,77	7,19%	here
1.A.3.d ii	0,5810	0,5810	-0,0001	-0,01%	here
1.A.4.a i	1,57	1,61	0,03	2,14%	here
1.A.4.a ii	0,00083	0,00084	0,00001	0,89%	here
1.A.4.b i	2,28	2,24	-0,03	-1,51%	here
1.A.4.b ii	0,33	0,26	-0,07	-21,39%	here
1.A.4.c i	0,08384	0,08383	-0,00001	-0,01%	here
1.A.4.c ii	0,80	1,01	0,20	25,47%	here

	Submission 2022	Submission 2023	Difference		Reasoning
NFR Sector	[t]			relative	see description and reasoning in:
NATIONAL TOTAL	524,59	529,72	5,13	0,98%	sub-category chapters
NFR 1 - Energy	469,12	474,36	5,24	1,12%	sub-category chapters
NFR 2 - IPPU	55,40068	55,29302	-0,10766	-0,19%	sub-category chapters
2.A.3	0,05840	0,05845	0,00005	0,08%	here
2.G	37,87183	37,76412	-0,10771	-0,28%	here
NFR 3 - Agriculture	NA				
NFR 5 - Waste	0,07	0,07	0,00	0,00%	
NFR 6 - Other	NA				