

Recalculations - Carbon Monoxide

Revision of Carbon Monoxide emissions over time

The significant changes in the **National Total reported for 1990 (-545 kt | -4 %)** are dominated by increased emission estimates from **NFRs 1.A.3.a ii(i), 1.A.3.b i and ii**. Additional smaller changes occur throughout NFR 1.

Here, the strongest relative change occurs for **NFR 1.A.3.a ii(i) with minus 83 %**.

Table 1: Changes in emission estimates for 1990

| NFR Sector | Submission 2020 | Submission 2021 | Difference | | Reasoning see description and reasoning in: |
|----------------------------|------------------|------------------|----------------|---------------|--|
| | [kt] | | | relative | |
| NATIONAL TOTAL | 13.716,30 | 13.171,06 | -545,24 | -3,98% | sub-category chapters |
| NFR 1 - Energy | 12.452,62 | 11.934,21 | -518,41 | -4,16% | sub-category chapters |
| 1.A.2.g vii | 82,27 | 82,70 | 0,43 | 0,52% | here |
| 1.A.3.a i(i) | 3,08 | 3,81 | 0,73 | 23,74% | here |
| 1.A.3.a ii(i) | 52,32 | 8,47 | -43,85 | -83,81% | here |
| 1.A.3.b i | 7.065,11 | 6.646,96 | -418,15 | -5,92% | here |
| 1.A.3.b ii | 356,13 | 315,30 | -40,83 | -11,46% | here |
| 1.A.3.b iii | 130,05 | 135,43 | 5,38 | 4,14% | here |
| 1.A.3.b iv | 241,56 | 226,62 | -14,94 | -6,18% | here |
| 1.A.4.a ii | 6,98 | 7,04 | 0,06 | 0,89% | here |
| 1.A.4.b ii | 64,43 | 56,25 | -8,18 | -12,70% | here |
| 1.A.4.c ii | 99,90 | 100,83 | 0,93 | 0,93% | here |
| NFR 2 - IPPU | 1.238,64 | 1.211,81 | -26,83 | -2,17% | sub-category chapters |
| 2.G | 46,05 | 19,23 | -26,83 | -58,25% | here |
| NFR 3 - Agriculture | NA | | | | |
| NFR 5 - Waste | 25,04 | 25,04 | 0,00 | 0,00% | |
| NFR 6 - Other | NA | | | | |

The strong changes in the **National Total reported for 2017 (+236 kt | +8.34 %)** are by far dominated by revised estimates for **NFR 1.A.3.b i (+ 303 kt)** accompanied by some more or less significant revisions throughout NFRs 1 and 2.

Here, the strongest relative changes occur for **NFRs 1.B.2.a iv with +580 % and 1.A.3.b ii with +191 %**.

Table 2: Changes in emission estimates for 2018

| NFR Sector | Submission 2020 | Submission 2021 | Difference | | Reasoning see description and reasoning in: |
|-----------------------|-----------------|-----------------|--------------|--------------|--|
| | [kt] | | | relative | |
| NATIONAL TOTAL | 2.937,91 | 2.957,80 | 19,89 | 0,68% | sub-category chapters |
| NFR 1 - Energy | 2.082,15 | 2.115,39 | 33,24 | 1,60% | sub-category chapters |
| 1.A.1.a | 103,95 | 104,81 | 0,86 | 0,82% | here |
| 1.A.1.b | 1,79 | 2,11 | 0,32 | 18,07% | here |
| 1.A.1.c | 11,89 | 12,11 | 0,23 | 1,90% | here |
| 1.A.2.a | 32,89 | 32,99 | 0,10 | 0,30% | here |
| 1.A.2.b | 0,147 | 0,151 | 0,004 | 2,58% | here |
| 1.A.2.c | IE | IE | #WERT! | #WERT! | here |
| 1.A.2.d | IE | IE | #WERT! | #WERT! | here |
| 1.A.2.e | 0,079 | 0,082 | 0,003 | 4,38% | here |
| 1.A.2.f | 155,98 | 142,33 | -13,65 | -8,75% | here |
| 1.A.2.g vii | 137,74 | 133,04 | -4,70 | -3,41% | here |
| 1.A.2.g viii | 18,77 | 18,09 | -0,68 | -3,60% | here |
| 1.A.3.a i(i) | 6,34 | 6,80 | 0,46 | 7,28% | here |
| 1.A.3.a ii(i) | 10,14 | 6,50 | -3,64 | -35,91% | here |
| 1.A.3.b i | 779,41 | 803,54 | 24,13 | 3,10% | here |

| | | | | | |
|---------------------|---------|---------|--------|---------|---|
| 1.A.3.b ii | 42,20 | 37,26 | -4,94 | -11,70% | here |
| 1.A.3.b iii | 45,67 | 44,45 | -1,22 | -2,68% | here |
| 1.A.3.b iv | 71,98 | 73,28 | 1,31 | 1,82% | here |
| 1.A.3.b v | NA | NA | #WERT! | #WERT! | here |
| 1.A.3.b vi | NA | NA | #WERT! | #WERT! | here |
| 1.A.3.b vii | NA | NA | #WERT! | #WERT! | here |
| 1.A.3.c | 1,21 | 1,05 | -0,16 | -12,86% | here |
| 1.A.3.d i(ii) | IE | IE | #WERT! | #WERT! | |
| 1.A.3.d ii | 3,47 | 4,01 | 0,54 | 15,63% | here |
| 1.A.3.e i | 0,26 | 0,26 | 0,01 | 2,11% | 1.A.3.e i - Pipeline Transport] |
| 1.A.3.e ii | NA | NA | #WERT! | #WERT! | 1.A.3.e ii - Other Transport: Other] |
| 1.A.4.a i | 49,23 | 44,17 | -5,06 | -10,28% | here |
| 1.A.4.a ii | 2,89 | 2,41 | -0,48 | -16,55% | here |
| 1.A.4.b i | 411,76 | 447,92 | 36,16 | 8,78% | here |
| 1.A.4.b ii | 112,03 | 114,19 | 2,16 | 1,93% | here |
| 1.A.4.c i | 13,93 | 13,84 | -0,09 | -0,67% | here |
| 1.A.4.c ii | 51,58 | 53,14 | 1,56 | 3,02% | here |
| 1.A.4.c iii | 0,22051 | 0,22647 | 0,01 | 2,70% | here |
| 1.A.5.a | 0,98 | 1,00 | 0,02 | 1,53% | here |
| 1.A.5.b | 10,47 | 10,47 | 0,00 | 0,00% | here |
| 1.B.1.a | NA | NA | #WERT! | #WERT! | here |
| 1.B.1.b | 4,57 | 4,57 | 0,00 | 0,00% | here |
| 1.B.1.c | NA | NA | #WERT! | #WERT! | here |
| 1.B.2.a i | NA | NA | #WERT! | #WERT! | |
| 1.B.2.a iv | 0,36 | 0,36 | 0,00 | 0,00% | |
| 1.B.2.a v | NA | NA | #WERT! | #WERT! | |
| 1.B.2.b | 0,11 | 0,11 | 0,00 | 0,00% | |
| 1.B.2.c | 0,12 | 0,12 | 0,00 | 0,00% | |
| 1.B.2.d | NA | NA | #WERT! | #WERT! | |
| NFR 2 - IPPU | 836,206 | 822,861 | -13,35 | -1,60% | sub-category chapters |
| 2.A.1 | IE | IE | #WERT! | #WERT! | here |
| 2.A.2 | IE | IE | #WERT! | #WERT! | here |
| 2.A.3 | IE | IE | #WERT! | #WERT! | here |
| 2.A.5.a | NA | NA | #WERT! | #WERT! | here |
| 2.A.5.b | NA | NA | #WERT! | #WERT! | here |
| 2.A.5.c | NA | NA | #WERT! | #WERT! | here |
| 2.A.6 | IE | IE | #WERT! | #WERT! | here |
| 2.B.1 | NA | NA | #WERT! | #WERT! | here |
| 2.B.2 | NA | NA | #WERT! | #WERT! | here |
| 2.B.3 | 0,08 | 0,08 | 0,00 | 0,00% | here |
| 2.B.5 | NA | NA | #WERT! | #WERT! | here |
| 2.B.6 | NE | NE | #WERT! | #WERT! | here |
| 2.B.7 | NA | NA | #WERT! | #WERT! | here |
| 2.B.10.a | 0,82 | 0,82 | 0,00 | 0,00% | here |
| 2.B.10.b | NA | NA | #WERT! | #WERT! | here |
| 2.C.1 | 713,31 | 713,30 | 0,00 | 0,00% | here |
| 2.C.2 | NE | NE | #WERT! | #WERT! | here |
| 2.C.3 | 95,20 | 95,20 | 0,00 | 0,00% | here |
| 2.C.4 | NA | NA | #WERT! | #WERT! | here |
| 2.C.5 | NA | NA | #WERT! | #WERT! | here |
| 2.C.6 | NA | NA | #WERT! | #WERT! | here |
| 2.C.7.a | NA | NA | #WERT! | #WERT! | here |
| 2.C.7.b | NO | NO | #WERT! | #WERT! | here |
| 2.C.7.c | NA | NA | #WERT! | #WERT! | here |
| 2.C.7.d | NA | NA | #WERT! | #WERT! | here |
| 2.D.3.a | NA | NA | #WERT! | #WERT! | here |

| | | | | | |
|----------------------------|--------|--------|--------|---------|------------------------------|
| 2.D.3.b | IE | IE | #WERT! | #WERT! | here |
| 2.D.3.c | NA | NA | #WERT! | #WERT! | here |
| 2.D.3.d | NA | NA | #WERT! | #WERT! | here |
| 2.D.3.e | NA | NA | #WERT! | #WERT! | here |
| 2.D.3.f | NA | NA | #WERT! | #WERT! | here |
| 2.D.3.g | NA | NA | #WERT! | #WERT! | here |
| 2.D.3.h | NA | NA | #WERT! | #WERT! | here |
| 2.D.3.i | NA | NA | #WERT! | #WERT! | here |
| 2.G | 26,81 | 13,47 | -13,34 | -49,76% | here |
| 2.H.1 | NE | NE | #WERT! | #WERT! | here |
| 2.H.2 | NA | NA | #WERT! | #WERT! | here |
| 2.H.3 | NA | NA | #WERT! | #WERT! | here |
| 2.I | IE | IE | #WERT! | #WERT! | here |
| 2.J | NE | NE | #WERT! | #WERT! | here |
| 2.K | NA | NA | #WERT! | #WERT! | here |
| 2.L | NA | NA | #WERT! | #WERT! | here |
| NFR 3 - Agriculture | 0,00 | 0,00 | 0,00 | #DIV/0! | sub-category chapters |
| 3.B.1.a | NA | NA | #WERT! | #WERT! | here |
| 3.B.1.b | NA | NA | #WERT! | #WERT! | here |
| 3.B.2 | NA | NA | #WERT! | #WERT! | here |
| 3.B.3 | NA | NA | #WERT! | #WERT! | here |
| 3.B.4.a | NA | NA | #WERT! | #WERT! | here |
| 3.B.4.d | NA | NA | #WERT! | #WERT! | here |
| 3.B.4.e | NA | NA | #WERT! | #WERT! | here |
| 3.B.4.f | NA | NA | #WERT! | #WERT! | here |
| 3.B.4.g i | NA | NA | #WERT! | #WERT! | here |
| 3.B.4.g ii | NA | NA | #WERT! | #WERT! | here |
| 3.B.4.g iii | NA | NA | #WERT! | #WERT! | here |
| 3.B.4.g iv | NA | NA | #WERT! | #WERT! | here |
| 3.B.4.h | NA | NA | #WERT! | #WERT! | here |
| 3.D.a.1 | NA | NA | #WERT! | #WERT! | here |
| 3.D.a.2.a | NA | NA | #WERT! | #WERT! | here |
| 3.D.a.2.b | NA | NA | #WERT! | #WERT! | here |
| 3.D.a.2.c | NA | NA | #WERT! | #WERT! | here |
| 3.D.a.3 | NA | NA | #WERT! | #WERT! | here |
| 3.D.a.4 | NA | NA | #WERT! | #WERT! | here |
| 3.D.b | NA | NA | #WERT! | #WERT! | here |
| 3.D.c | NA | NA | #WERT! | #WERT! | here |
| 3.D.d | NA | NA | #WERT! | #WERT! | here |
| 3.D.e | NA | NA | #WERT! | #WERT! | here |
| 3.D.f | NA | NA | #WERT! | #WERT! | here |
| 3.F | NO | NO | #WERT! | #WERT! | |
| 3.I | NA | NA | #WERT! | #WERT! | here |
| NFR 5 - Waste | 19,550 | 19,550 | 0,00 | 0,00% | sub-category chapters |
| 5.A | NA | NA | #WERT! | #WERT! | here |
| 5.B.1 | NA | NA | #WERT! | #WERT! | here |
| 5.B.2 | NA | NA | #WERT! | #WERT! | here |
| 5.C.1.a | NO | NO | #WERT! | #WERT! | |
| 5.C.1.b i | NO | NO | #WERT! | #WERT! | |
| 5.C.1.b ii | NO | NO | #WERT! | #WERT! | |
| 5.C.1.b iii | NO | NO | #WERT! | #WERT! | |
| 5.C.1.b iv | NO | NO | #WERT! | #WERT! | |
| 5.C.1.b v | 0,09 | 0,09 | 0,00 | 0,00% | here |
| 5.C.1.b vi | NA | NA | #WERT! | #WERT! | |
| 5.C.2 | 19,46 | 19,46 | 0,00 | 0,00% | here |
| 5.D.1 | NA | NA | #WERT! | #WERT! | here |

| | | | | | |
|----------------------|------|------|--------|---------|----------------------|
| 5.D.2 | NA | NA | #WERT! | #WERT! | here |
| 5.D.3 | NO | NO | #WERT! | #WERT! | |
| 5.E | NE | NE | #WERT! | #WERT! | here |
| NFR 6 - Other | 0,00 | 0,00 | 0,00 | #DIV/0! | [[|