

# Country fact sheet: Czechia

## 1. Total greenhouse gas emissions

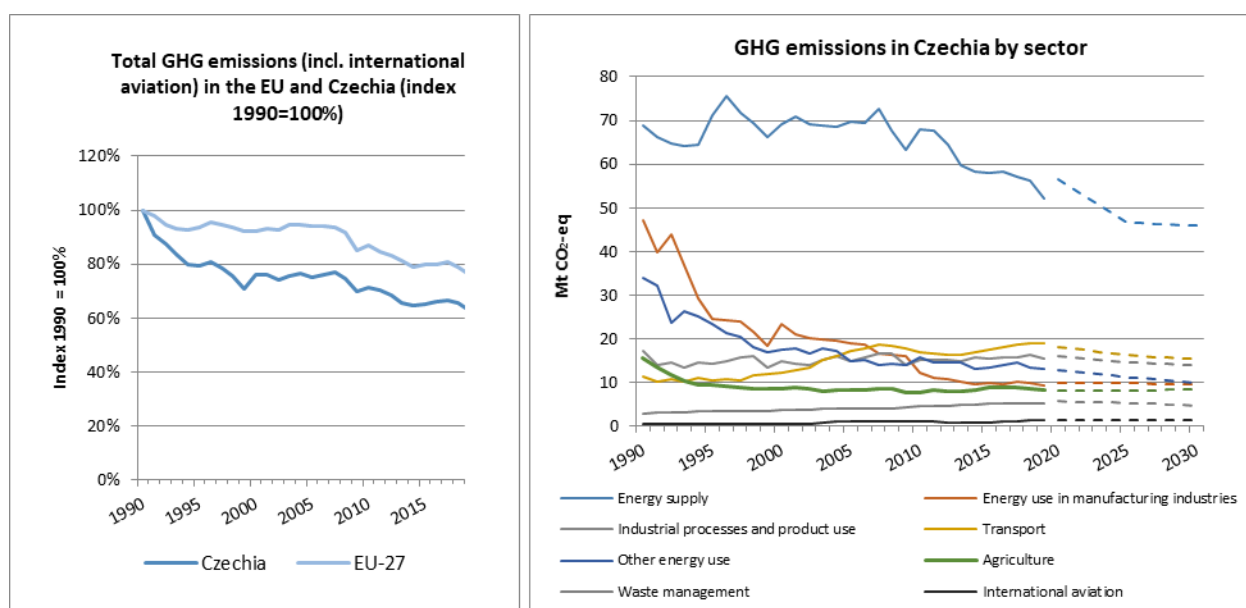


Figure 1: Left hand side: Total greenhouse gas emissions (incl. international aviation) 1990-2020 (index 1990 = 100 %). Right hand side: Greenhouse gas emissions by sector<sup>1</sup> – historical emissions 1990-2019, proxy 2020, projections WEM 2021-2030 (Mt CO<sub>2</sub>-eq).

<sup>1</sup> The sectors in the figure correspond to the following IPCC sectors: Energy supply: 1A1, 1B and 1C. Energy use in manufacturing industries: 1A2. Industrial processes and product use: 2. Transport: 1A3. Other energy use: 1A4, 1A5 and 6. Agriculture: 3. Waste: 5. International aviation: 1.D.1.a.

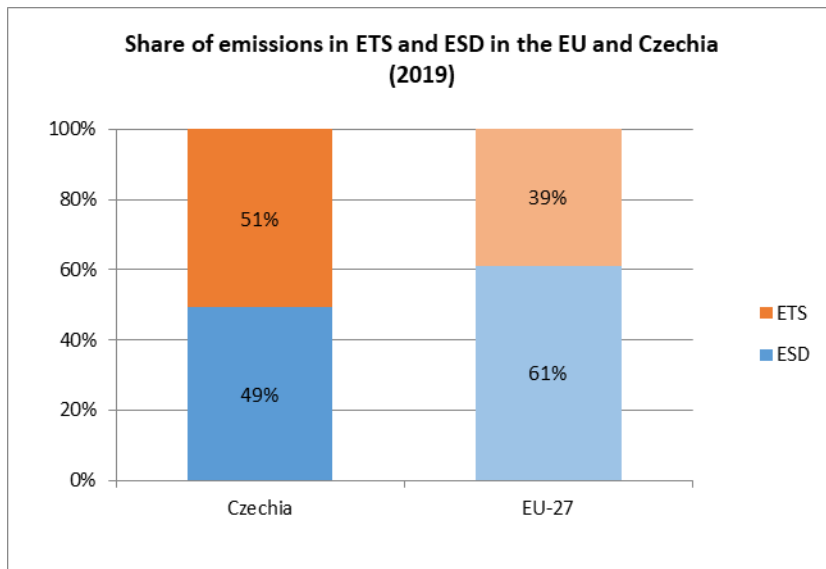


Figure 2: Share of emissions covered by the ETS and the ESD (2019).<sup>2</sup>

## 2. ETS emissions

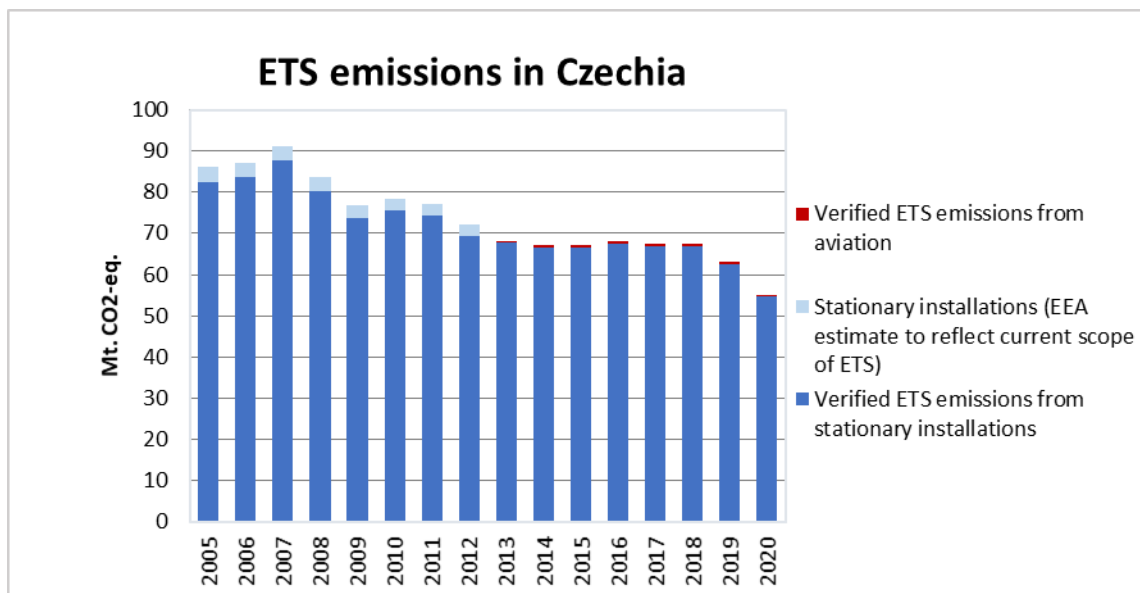


Figure 3: ETS emissions 2005-2020 (Mt CO<sub>2</sub>-eq).<sup>3</sup>

<sup>2</sup> Excluding international aviation and NF<sub>3</sub>.

<sup>3</sup> The scope of ETS was extended from 2013. To reflect the current scope of ETS, estimates made by EEA are included in the figures from 2005 to 2012. The estimates cover only emissions from stationary installations.

### 3. Emissions in Effort Sharing sectors

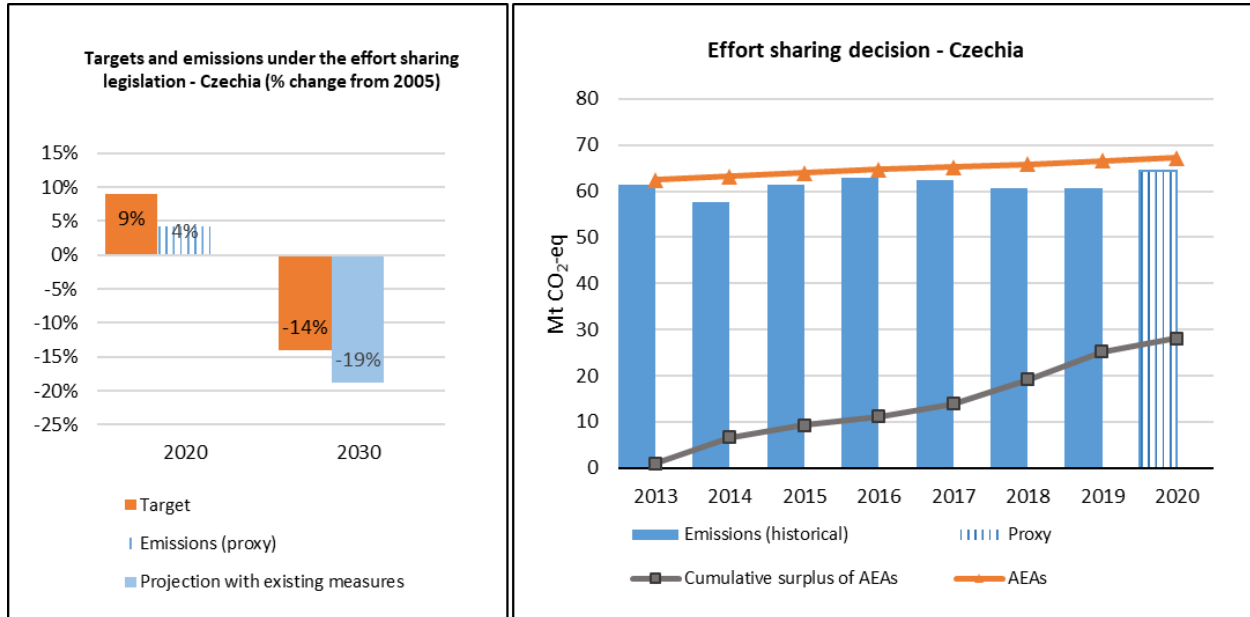
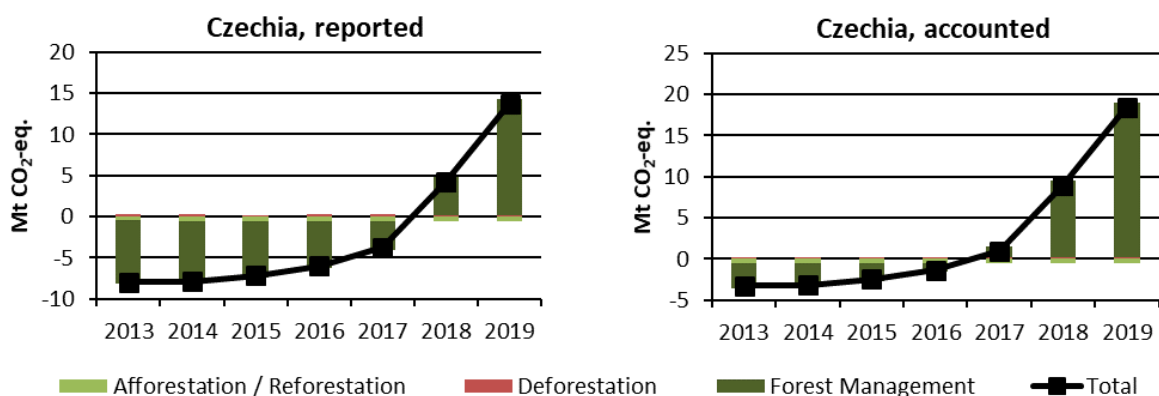


Figure 4: Left hand side: Emissions and targets under the Effort Sharing Decision/ Effort Sharing Regulation 2020 and 2030 as percentage change from 2005. Right hand side: Emissions, annual emission allocations (AEAs) and accumulated surplus/ deficit of AEAs under the Effort Sharing Decision 2013-2020 (Mt CO<sub>2</sub>-eq).

## 4. Land use, land use change and forestry



**Figure 5: Reported and accounted emissions and removals from LULUCF (Mt CO<sub>2</sub>-eq.)<sup>4</sup>**

Reported quantities under the Kyoto Protocol for the Czech Republic show net average annual removals of -2.1 Mt CO<sub>2</sub>-eq for the period 2013 to 2019. In this regard, the Czech Republic contributes with 0.6% to the annual average sink of -344.9 Mt CO<sub>2</sub>-eq of the EU-27. Accounting for the same period depicts net debits of, on average, 2.6 Mt CO<sub>2</sub>-eq, which represents -2.2% of the EU-27 accounted sink of -115.0 Mt CO<sub>2</sub>-eq. Reported net removals show an overall accelerating decreasing trend that turns into net emissions in 2018 and 2019. This pattern replicates in the accounted quantities when small net credits turned into net debits in 2017 with a substantial rise in 2018 and 2019. The Czech Republic is one of six EU Member States that show net emissions for at least one year. In addition, the Czech Republic is one of six EU Member States with average net debits and one of 14 EU Member States with net debits for at least one year in this preliminary accounting exercise.

The dominating reported activity is Forest Management with removals from 2013 to 2017 and emissions in 2018 and 2019. The Czech Republic is one of four EU Member States with emissions by Forest Management for at least one year. The main reason for this trend is a series of dry seasons since 2015, which led to bark beetle outbreaks that require necessary sanitary action including wood removal. Total harvest increased by 96% from 2015 to 2019. The share of salvage logging on the total harvest amounted to 95% in 2019 (17% in 2005 and 61% in 2017). Removals by Afforestation/Reforestation are small, and emissions by Deforestation can be neglected in the overall emission budget of the LULUCF sector. Removals by Forest Management show an accelerated decline over the seven-year period and turn into notable emissions of 4.7 Mt CO<sub>2</sub>-eq in 2018 and 14.1 Mt CO<sub>2</sub>-eq in 2019.

Credits by Forest Management turn into debits for as of 2017 and reach 9.4 Mt CO<sub>2</sub>-eq in 2018 and 18.8 Mt CO<sub>2</sub>-eq in 2019. The Czech Republic is one of 13 EU Member States with debits by Forest Management for at least one year. Credits by Afforestation/Reforestation are small and debits by Deforestation negligible.

<sup>4</sup> The differences between reported and accounted emissions from LULUCF under the Kyoto Protocol are described in the 'explanatory note on LULUCF – accounted and reported quantities under the Kyoto Protocol'.

## Data sources

Figure 1: Annual European Union greenhouse gas inventory 1990–2019 (EEA greenhouse gas data viewer: <https://www.eea.europa.eu/data-and-maps/data/data-viewers/greenhouse-gases-viewer>). *Approximated EU greenhouse gas inventory 2020* (European Environment Agency). Member States national projections, reviewed by the European Environment Agency.

Figure 2: Verified ETS emissions extracted from European Union Transaction Log 01.07.2021 (EEA ETS data viewer: <https://www.eea.europa.eu/data-and-maps/dashboards/emissions-trading-viewer-1>). ESD data from European Commission: *Commission Implementing Decision (EU) on greenhouse gas emissions covered by Decision No 406/2009/EC of the European Parliament and of the Council for the year 2019 for each Member State* (forthcoming).

Figure 3: extract from European Union Transaction Log 01.07.2021 (EEA ETS data viewer: <https://www.eea.europa.eu/data-and-maps/dashboards/emissions-trading-viewer-1>).

Figure 4: European Commission: *Commission Implementing Decisions on greenhouse gas emissions for each Member State for the years 2013-2019 under the Effort Sharing Decision* ([Implementation of the Effort Sharing Decision \(europa.eu\)](#)). *Approximated EU greenhouse gas inventory 2020* (European Environment Agency). Member States national projections, reviewed by the European Environment Agency.

Figure 5: European Commission based on data accounted and reported by Member States under the Kyoto Protocol.