## Lesson 7 Data Sheet:

## The Increasing Number of Cars

- At the start of the twentieth century, there were only about 8,000 cars in the United States and possibly not more than 25,000 worldwide.
- Most cars in the early 1900s were located in either the United States or Europe. In 1908, for example, there were only about 20 cars in Tokyo, Japan.
- There were 300 cars in the United States in 1895, 78,000 in 1905, 459,000 in 1910 and 1.7 million in 1914.
- In 1903 just under 63,000 cars were built in the world of which about half were produced in France.
- By 1910 there were 100,000 cars in Great Britain.
- By 1968 the worldwide figure had increased to 170 million; a figure that had more than doubled to 375 million by 1985.
- In 2002 there were 530 million cars worldwide, of which about $\mathbf{2 5 \%}$ ( $\mathbf{1 3 0}$ million) were in the United States.


## World Annual Car Production 2004-2014

| Year | Total Cars Produced |
| :---: | :---: |
| $\mathbf{2 0 0 4}$ | $64,496,220$ |
| $\mathbf{2 0 0 5}$ | $66,719,519$ |
| $\mathbf{2 0 0 6}$ | $69,222,975$ |
| $\mathbf{2 0 0 7}$ | $73,266,061$ |
| $\mathbf{2 0 0 8}$ | $70,729,696$ |
| $\mathbf{2 0 0 9}$ | $61,762,324$ |


| Year | Total Cars Produced |
| :---: | :---: |
| 2010 | $77,583,519$ |
| 2011 | $79,880,920$ |
| 2012 | $84,236,171$ |
| 2013 | $87,595,998$ |
| 2014 | $89,776,465$ |

Figure 7.1
Source: http://www.oica.net/category/production-statistics/2014-statistics/

## World Car Production 1898-2007



Figure 7.2
Source: http://revel.unice.fr/eriep/?id=3301


Figure 1. Atmospheric concentrations of important long-lived greenhouse gases over the last 2,000 years. Increases since about 1750 are attributed to human activities in the industrial era. Concentration units are parts per million (ppm) or parts per billion (ppb), indicating the number of molecules of the greenhouse gas per million or billion air molecules, respectively, in an atmospheric sample.

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Figure 7.3
Source: http://www.global-greenhouse-warming.com/greenhouse-gas.html
Note: Double y-axis graph. $\mathrm{CO}_{2}$ and $\mathrm{N}_{2} \mathrm{O}$ use the scale on the left y-axis and $\mathrm{CH}_{4}$ uses the scale on the right y-axis. The "Years" x-axis starts at year 1 AD ("year 0" does not exist) and goes through the year 2000 AD.


Figure 7.4
Source: https://www.wired.com/2012/07/1-billion-cars-infographic/

## Transportation Greenhouse Gas (GHG) Emissions in the U.S.

2015 U.S. GHG Emissions by Sector


Electricity - 29\%
Transportation - 27\%
Industry - 21\%
Agriculture - 9\%
Commercial - 7\%
Residential - 6\%

2015 U.S. Transportation Sector GHG Emissions by Source


- Light-Duty Vehicles - 60\%

Medium- and Heavy-Duty Trucks - 23\%
Aircraft - 9\%
Other - 4\%
Rail - 2\%
Ships and Boats - 2\%

Figure 7.5
Source: https://www.epa.gov/greenvehicles/fast-facts-transportation-greenhouse-gas-emissions

Carbon Dioxide Emissions from Burning of Fossil Fuels - 2006


Figure 7.6

Source: https://publications.europa.eu/en/publication-detail/-/publication/41811494-f131-11e8-9982-01aa75ed71a1/language-en

