**FROM INDUSTRY 1.0 TO INDUSTRY 4.0:**

**THE 4 INDUSTRIALS REVOLUTIONS**

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The **1st Industrial Revolution** took place in Great Britain at the end of the 18th century. Thanks to the introduction of ***steam power*** and due to efficient transports, there was a transition from hand production methods to new manufacturing processes and ***mechanical* *automation***. It was the rise of the ***factory system*** that spread all over the world.

The advent of ***electrical power*** at the end of 19th century and the introduction of the ***assembly line*** and of the ***conveyor belt*** in industries made production faster and more automated, giving way to ***mass production***and to a process of full ***industrialization***. That’s **the 2nd Industrial Revolution**.

The late 20th century saw another shift from traditional industry to an economy based on information (**the 3rd Industrial Revolution**). It’s the age of ***electronic automation*** and ***computer systems***. Industrial manufacturing declined while the service sector started to grow, leading to a process of de-industrialization, or a decrease of industrial manufacturing in favour of the tertiary or service industry (information technology, telecommunications, finance and other services), tied to the advent of ***personal computers***.

In the early 2000s quaternary industries took over (**the 4th Industrial Revolution**). ***Artificial intelligence***, ***big data***, ***robotics*** and *cyber physical systems* are the protagonists of this ***smart*** revolution, where the machine themselves, in an interaction and exchange of information, make the production highly automated and efficient.

