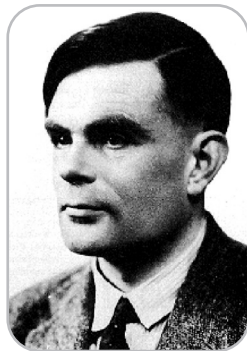


Artificial intelligence

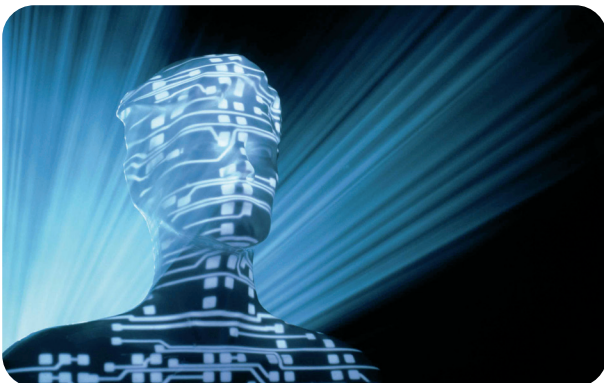
Par. 1 – Artificial intelligence, or AI for short, is one of the most exciting areas of robotics. AI is a combination of computer science, physiology, and philosophy. It is a **broad** topic, consisting of different fields with a common denominator: the creation of machines that can “think”.

Par. 2 – Within this fascinating area there are three main schools: trying to model what humans do, trying to do what people do but easier and better, and trying to build new tools with “fantastic” capabilities.

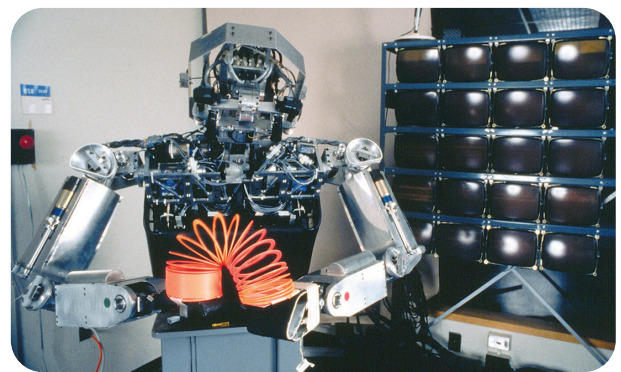
Par. 3 – The three schools all agree on one point: trying to build machines that model what humans do. So AI researchers try to enable computers and machines to **mimic** human intelligence and sensory processing abilities, and model human behaviour with computers to improve our understanding of intelligence.



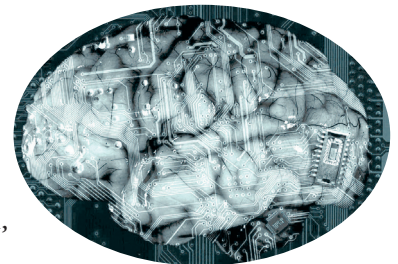
Par. 4 – Perhaps the best way to measure the intelligence of a machine is the test of the British computer scientist Alan Turing (*Computing Machinery and Intelligence*, 1950). He stated that a computer would **deserve** to be called intelligent if it could **deceive a human into believing** that it was human.



Par. 5 – Over the last decades the number of AI researchers has grown from a dozen to thousands of engineers and specialists; and from programs capable of playing **chess** to systems designed to diagnose **disease**. Advanced-level computer languages, as well as computer interfaces and word-processors **owe** their existence to the research into artificial intelligence.



Par. 6 – Nowadays the many **branches** of AI research include machine learning, inference, cognition, knowledge representation, problem solving, **case-based** reasoning, natural language understanding, speech recognition, computer vision, and artificial neural networks. The advancements in the **quest** for artificial intelligence have **affected**, and will continue to affect our jobs, education, and lives.



to affect: *influenzare*

branch: *ramo, settore*

broad: *ampio*

case-based: *basato su casi reali*

chess: *scacchi*

to deceive someone into believing something: *far credere a qualcuno*


to deserve: *meritarsi*

disease: *malattia*

to mimic: *imitare*

to owe: *dovere*

quest for: *ricerca di*


1  Label the paragraphs choosing from the list below.

- Par. 1: a. Schools of thought
- Par. 2: b. Present and future developments
- Par. 3: c. Definition of AI
- Par. 4: d. Recent developments
- Par. 5: e. Robot's intelligence test
- Par. 6: f. The aim of science



2  Find in the text the equivalents of the following Italian words and expressions.

- 1. Uniformarsi:
- 2. Di gran lunga maggiori:
- 3. Imitare:
- 4. Diagnosticare:
- 5. Malattia:
- 6. Essere in debito di:

3  Complete the following sentences.

- 1. AI is a branch of science whose aim is
- 2. The three schools within this science agree on one point:
- 3. Alan Turing stated that a computer would deserve to be called intelligent if
- 4. Advanced-level computer languages owe their existence to
- 5. The number of AI researchers has grown from
- 6. The many branches of AI research include