

Discovering Artificial Intelligence



“ with Jay-Jay and
Teacher MAJACO ”



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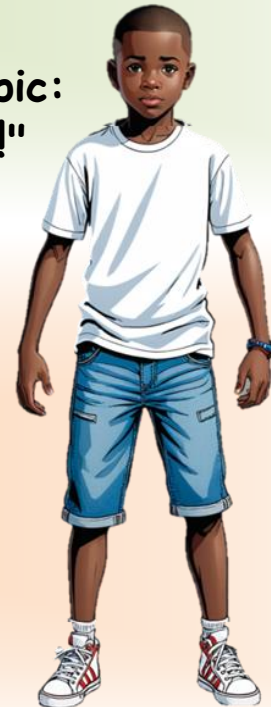
Discovering Artificial Intelligence

A pedagogical tool for introducing
children to Artificial Intelligence





**"Welcome to school!
Today, we are going to
explore a fascinating topic:
Artificial Intelligence!"**





The atmosphere was joyful that morning in a classroom in an African country.

Jay-Jay and his classmates were very excited because they had been promised that their teacher would talk to them about a very interesting subject: Artificial Intelligence.

Being particularly curious, Jay-Jay was the first to raise his hand.

- **"Please, Teacher MAJACO, what is Artificial Intelligence?"**

The teacher, Mrs MAJACO, smiled and exclaimed:

-**"Very good question, Jay-Jay! Artificial Intelligence, or AI, is when machines can learn and do things like humans."**





The students were quite confused, as it seemed impossible to them that a machine could learn.

So another student asked:

- "But... how can a machine learn?"



The teacher then took a chalk and drew a robot on the blackboard:

- "Imagine a robot learning to play a game.

At first, it knows nothing.

But by playing several times, it begins to understand and improve."





-“Hey! It’s like when I learn to play football!” exclaimed Jay-Jay, who seemed to grasp the similarity.

The teacher nodded and then showed an image with many objects, saying:

**-“Exactly, Jay-Jay!
But for AI to work, it needs data, like texts, numbers, images, or sounds.”**





From that moment on, all the students were excited.
A girl stood up and then asked:
- **"So, the more data there is, the better AI learns?"**

With a nod, Teacher MAJACO confirmed:
- **"Absolutely!
It's like learning by reading more and more books."**





After a few seconds of silence,
Jay-Jay decided to reignite the
conversation:

-**"Thank you, Teacher MAJACO.
But what else can we do with AI?"**

The teacher replied:

-**"AI is everywhere!**

**It's in healthcare, education,
agriculture, businesses, and even
in sports and entertainment.**

**In short, AI exists in every field
you can imagine!"**





Satisfied with the interest shown by the students, Teacher MAJACO continued:

-“For example, in our daily lives, AI helps with voice assistants, like when we ask a phone to play music.”

-“In education, AI can help me prepare lessons or grade your homework.

It can also create personalized learning programs for each of you, helping you progress at your own pace.”





-“In healthcare, AI helps doctors diagnose diseases faster by analyzing medical images. AI is even useful for discovering new medications. ”

Seeing the amazed expressions of the students, Teacher MAJACO continued with more examples:

-“With AI, I can see if my plants are healthy by quickly detecting pests. A farmer can even know in advance the level of his harvests.”





-“In the business world, AI analyzes data to forecast sales or improve customer service.

It can also summarize long documents or recruit the best employees.”

The teacher ended with a wink towards Jay-Jay:

-“In sports, AI helps athletes improve their performance by analyzing their training data.

But AI also helps referees make better decisions.”





And Teacher MAJACO concluded with one last example:

-“And in leisure activities, AI suggests movies or video games based on what each of you already likes. So you understand that it's AI that allows us to receive messages on our Facebook that might interest us, as well as friend suggestions.”

All these examples led to a thunderous applause. This prompted Teacher MAJACO to take a short break, allowing the students to discuss among themselves.





She took the opportunity to quickly and discreetly write something on the blackboard.

Of course, Jay-Jay did not let himself be distracted and then asked:

-“Please, Teacher MAJACO, what is ChatGPT?

And what can we do with it? ”

Still smiling, Teacher MAJACO explained:

-“ChatGPT is what we call a **Generative AI**.

AIs of this kind can write stories, answer questions, create images, and even help with homework.”





But very quickly, Teacher MAJACO tempered the enthusiasm of the students by specifying:

- “But to make good use of **Generative AIs**, you need to write a **correct prompt**.”

- “A prompt? What is that?” asked Jay-Jay.

With a mysterious look, Teacher MAJACO replied:

- “A **prompt** is an instruction, like a sentence, that you give to the machine so that the AI produces exactly what you expect from it.

A prompt must therefore be clear and precise.”





Faced with so many applications and possible uses of Artificial Intelligence, one of the students said softly:

-“AI is really fascinating!”

It was then that Teacher MAJACO took on a rather serious expression and said:

-“That’s true. But be careful!

AI also has limitations because it doesn’t understand like we do.

It can sometimes make mistakes.”





-“And there are risks and dangers if AI is misused.

For example, if we create an AI using bad data, its decisions can also be flawed.

And that makes sense!

For example, if the history lesson I’m giving you contains errors, the summary produced by ChatGPT will not be satisfactory at all.”

Seeming to understand the limits of AI, and a bit worried while being eager to learn more, a student asked:

-“Please, Teacher, can you also give us examples of the risks or dangers of AI?”





Teacher MAJACO took on an even more serious expression to say:

-“The risks include errors in important decisions, like in healthcare in the event of a misdiagnosis, or safety in the case of an accident involving a self-driving car.”

-“But more importantly, some people can use AI for malicious purposes.

For example, to steal your parents' banking information and withdraw money from their bank account...

Or even to generate and share on social media a false image of you committing mischief, like stealing from a store.”





The class suddenly became very quiet. Imagining what his classmates were thinking, a student declared, completely disillusioned:

-“But ultimately, Artificial Intelligence is rather dangerous!”

Teacher MAJACO immediately sought to reassure the students:

-“Not necessarily, children! AI can be very useful if used correctly; especially since it has many benefits as you have seen with the examples I gave you. But it is essential to use it carefully and to put rules in place.”





And as if by magic, the collective enthusiasm was felt again in the classroom.

Just as the bell rang for recess, Jay-Jay insisted on asking one last question:

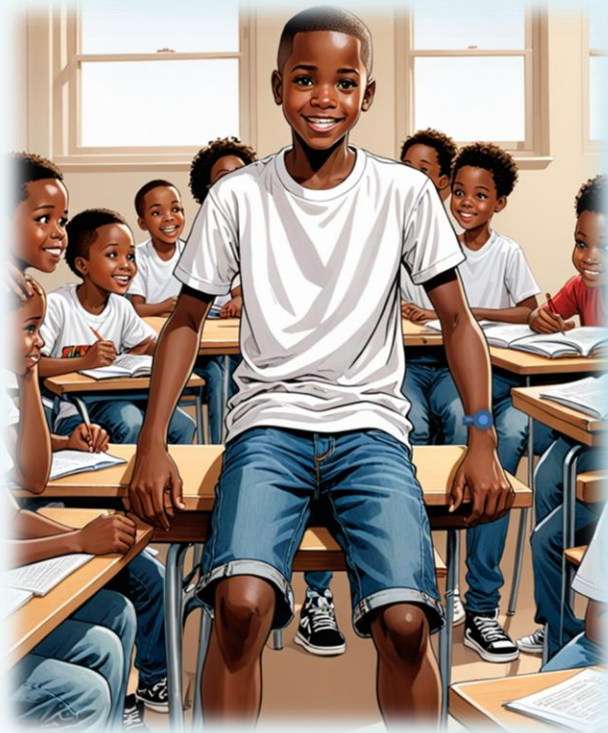
**-“AI sounds really great!
Can I create my own robot one day?”**

With an encouraging smile, Teacher MAJACO replied in conclusion to this lesson:

-“Of course, Jay-Jay. With learning and practice, you can achieve great things!

**But don't forget to be responsible.
And remember all of you, children,
knowledge is our best tool!”**





"And that's how Jay-Jay and his classmates discovered the fascinating and complex world of Artificial Intelligence!"



Artificial Intelligence: a myriad of applications

NB: The applications of Artificial Intelligence in the business world are not presented here. However, it can be explained to the child that these applications are very numerous and concern:

- ↳ the company in its functions (performance management, marketing and sales, finance and accounting, technical and production, human resources, legal, etc.);
- ↳ the sectors of activity (agriculture, trade and distribution, transport, banking and insurance, telecommunications, media and communication, accommodation and tourism, etc.);
- ↳ improving employee productivity (data analysis, text generation, work organization, meeting management, etc.).

AI applications in private life



Area	Applications	Area	Applications
Leisure and entertainment	- Information flows and entertainment - Generation of texts, images, sounds, videos - Programming songs and movies - Immersive video game experiences - Intelligent informative drones	Family economy	- Research and recommendation of items - Transport optimization - Energy consumption optimization - Management of personal finances
Health and Fitness	- Real-time health parameters - Fitness plans and virtual coaches - Assistance in medical diagnostics - Assistance in medical treatment - Generation of meal plans	Communication social relations	- Automatic text translation - Automatic text entry - Facial recognition - Conversational robots - Voice assistance
Domestic tasks	- Automatic on/off (lights, air conditioners...) - Intelligent household robots - Generation of cooking recipes - Automatic recording of TV programs - Interactive planning	Education and culture	- Search engines and dialogue engines - Personalization of news feeds - Personalized e-learning - Assistance with school revisions

AI applications in the fields of society



Area	Applications	Area	Applications
Education	✂ Creation of educational content ✂ Revision assistance (materials, exercises) ✂ Clustering description of learners ✂ Adaptive learning ✂ Multicriteria school guidance ✂ Automatic assessment/detection of cheating ✂ Prediction of school dropouts	Protection and security	✂ Email/spam filtering ✂ Detection of coding errors ✂ Detection of hackers ✂ Facial identification ✂ Detection of at-risk profiles ✂ Smoke and leak detection ✂ Detection of fights and shootings ✂ Reconnaissance/combat robots and drones
Health and medicine	✂ Medical diagnostics and prognostics ✂ Epidemic prediction ✂ Treatment of diseases ✂ Drug discovery (new molecules) ✂ Stock management in pharmacies	Law and justice	✂ Generation and summarization of legal documents ✂ Jurisprudential classification ✂ Predictive justice (innocence rates of accused) ✂ Prediction of risks and recidivism ✂ Justice dashboard ✂ Legal chatbots
Sports	✂ Analysis of sports performance ✂ Talent detection ✂ Personalized training and coaching programming ✂ Injury prevention ✂ Video analysis and tactical optimizations ✂ Prediction of results and performances ✂ Assistance in refereeing ✂ On-demand visualization	Public services	✂ Chatbot guides for administrative procedures ✂ Processing requests for official documents ✂ Detection of frauds and errors in administrative documents ✂ Identification of social trends and problems ✂ Control and security of state finances ✂ Optimized management of state assets and services ✂ Processing of public tender applications ✂ Data insights in public education and health ✂ Urbanization control systems ✂ Road safety improvement systems ✂ Crime prevention and monitoring
Religion	✂ Content generation (prayers and sermons) ✂ Personalized religious teaching ✂ Conversational robots ✂ Optimization of donation collection and analysis		

Dans la collection: L'Intelligence Artificielle pour tous et partout en Afrique



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Discovering Artificial Intelligence

In a classroom in an African country, students, led by their teacher Mrs. MAJACO, discover Artificial Intelligence (AI). Jay-Jay, a particularly curious student, asks questions about this fascinating concept.

The teacher explains that AI allows machines to learn and perform tasks similar to humans. She illustrates her explanations with concrete examples, such as the use of AI in different fields such as health, education, agriculture, sports, entertainment and the business world. Students learn that an AI needs data to function and that the more data it has, the better it can learn.

Teacher MAJACO also introduces ChatGPT, a Generative AI capable of creating stories, generating images and helping with homework; while specifying the importance of writing clear and precise prompts. She warns against the limits and dangers of AI, such as errors in medical diagnoses or the malicious use of artificial intelligence.

At the end of the lesson, she encourages students to use AI responsibly, emphasizing that knowledge is a powerful tool. The class leaves excited about discovering this fascinating and complex world.

