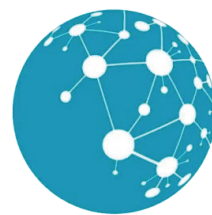




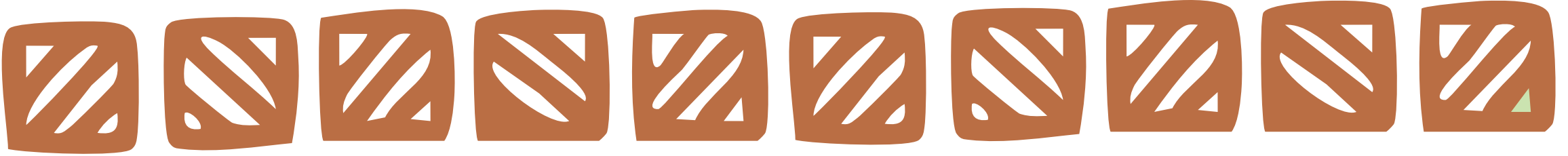
**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
FOUNDATION



# Quick Questions for You!



**Have you ever used AI? What  
do you think it can do?**

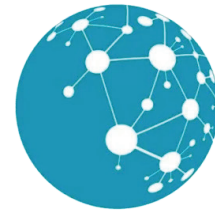


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
FOUNDATION

# **Have you ever watched a cartoon that talks back?**



## **AI in Daily Life**





# That's AI helping out!

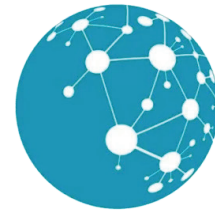


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
F O U N D A T I O N

# Have you ever asked a game for help?



## AI in Games



**That's AI giving you a hand!**

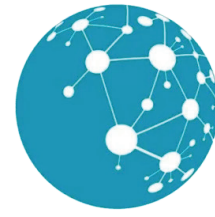


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
FOUNDATION

# What does AI mean?



# What is AI?





# AI

## Artificial Intelligence

Computers that act smart!

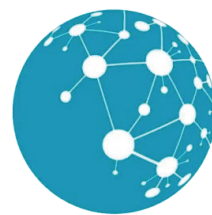


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
F O U N D A T I O N



# **AI in the house**





**AI can change TV channels, play music, or remind you of cartoons.**

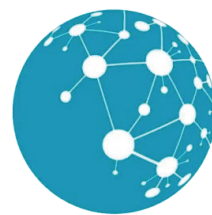


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
FOUNDATION



# AI at Work





**AI helps farmers pick eggs or  
milk cows. It helps factories too.**

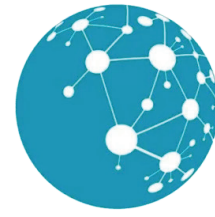


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
FOUNDATION



# AI in School



# AI helps teachers plan lessons and helps kids learn better.



**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE

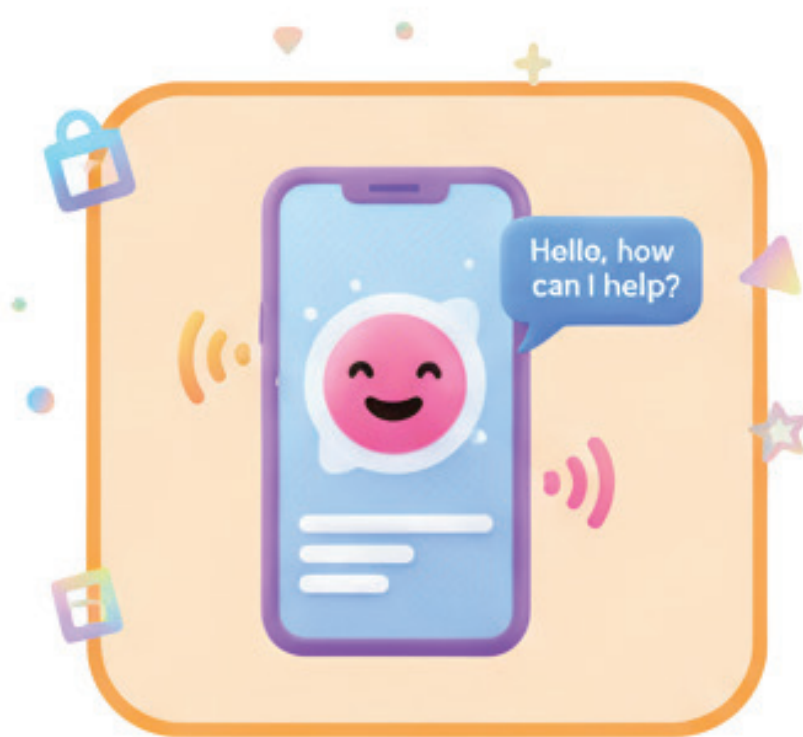
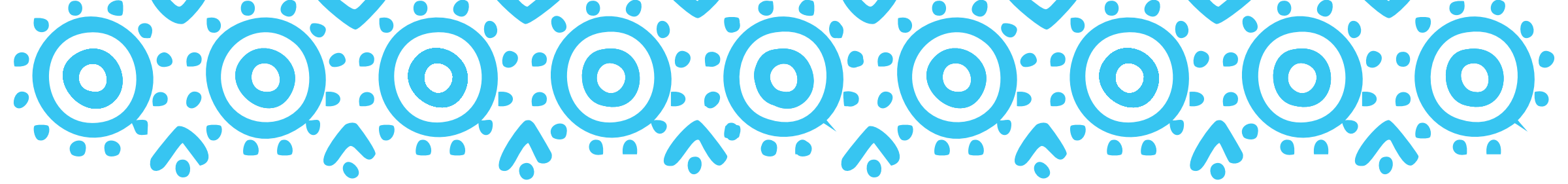


**Patrick J McGovern**  
FOUNDATION



# Examples of AI





Siri, Google, Facebook posts,  
even Jumia shopping.

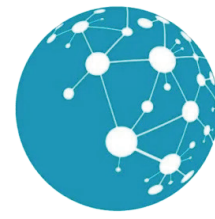


BRAIN BUILDERS  
YOUTH DEVELOPMENT  
INITIATIVE

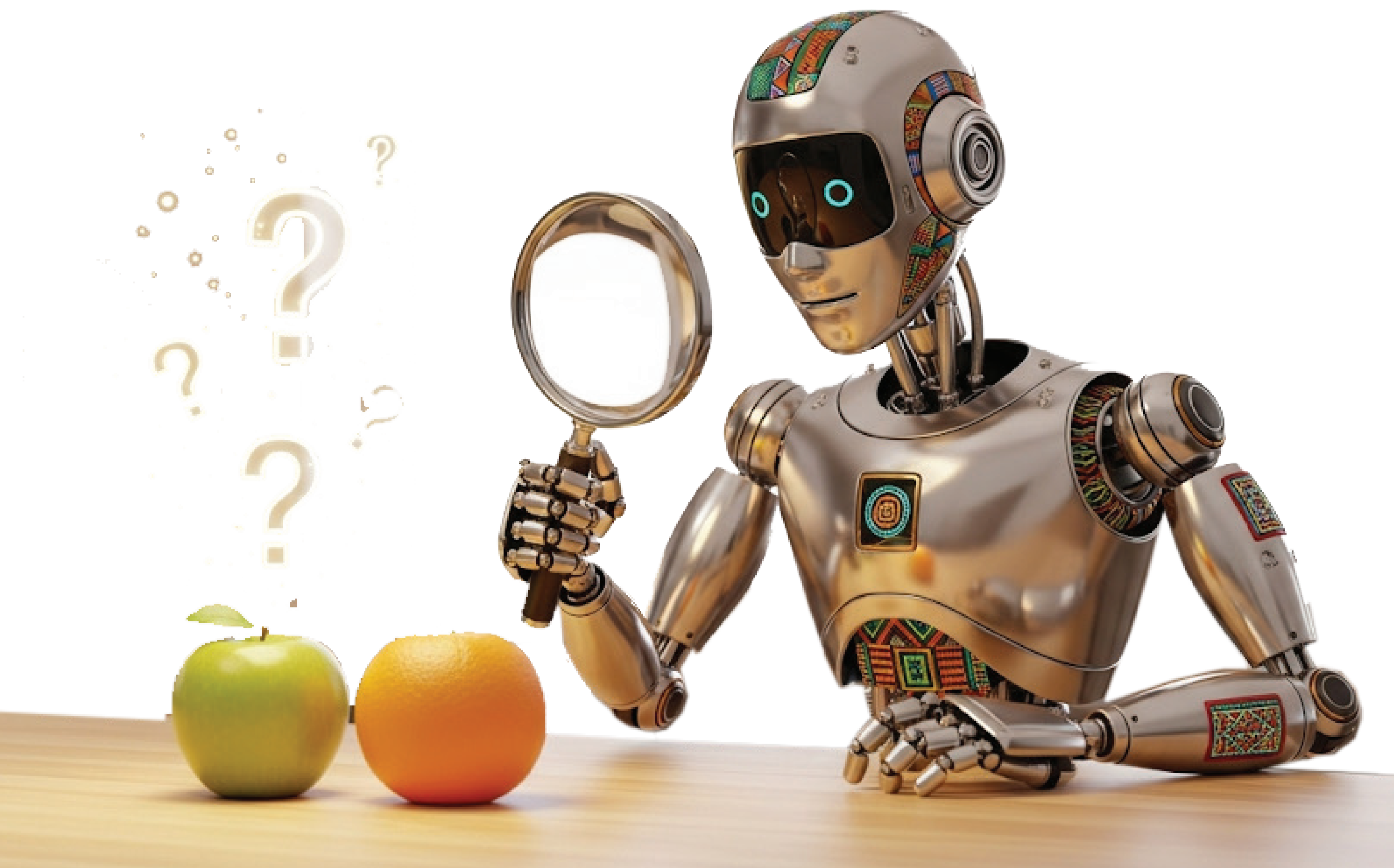




**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
F O U N D A T I O N



# How does AI work?



**AI studies many examples,  
then makes a guess!**

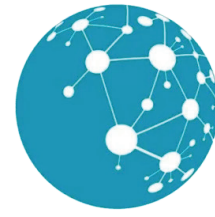


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
FOUNDATION



# What are algorithms?





They are like steps for  
cooking eba—follow them to  
get it right.



**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE

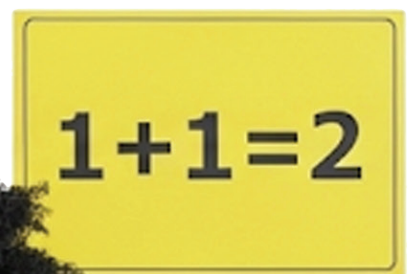
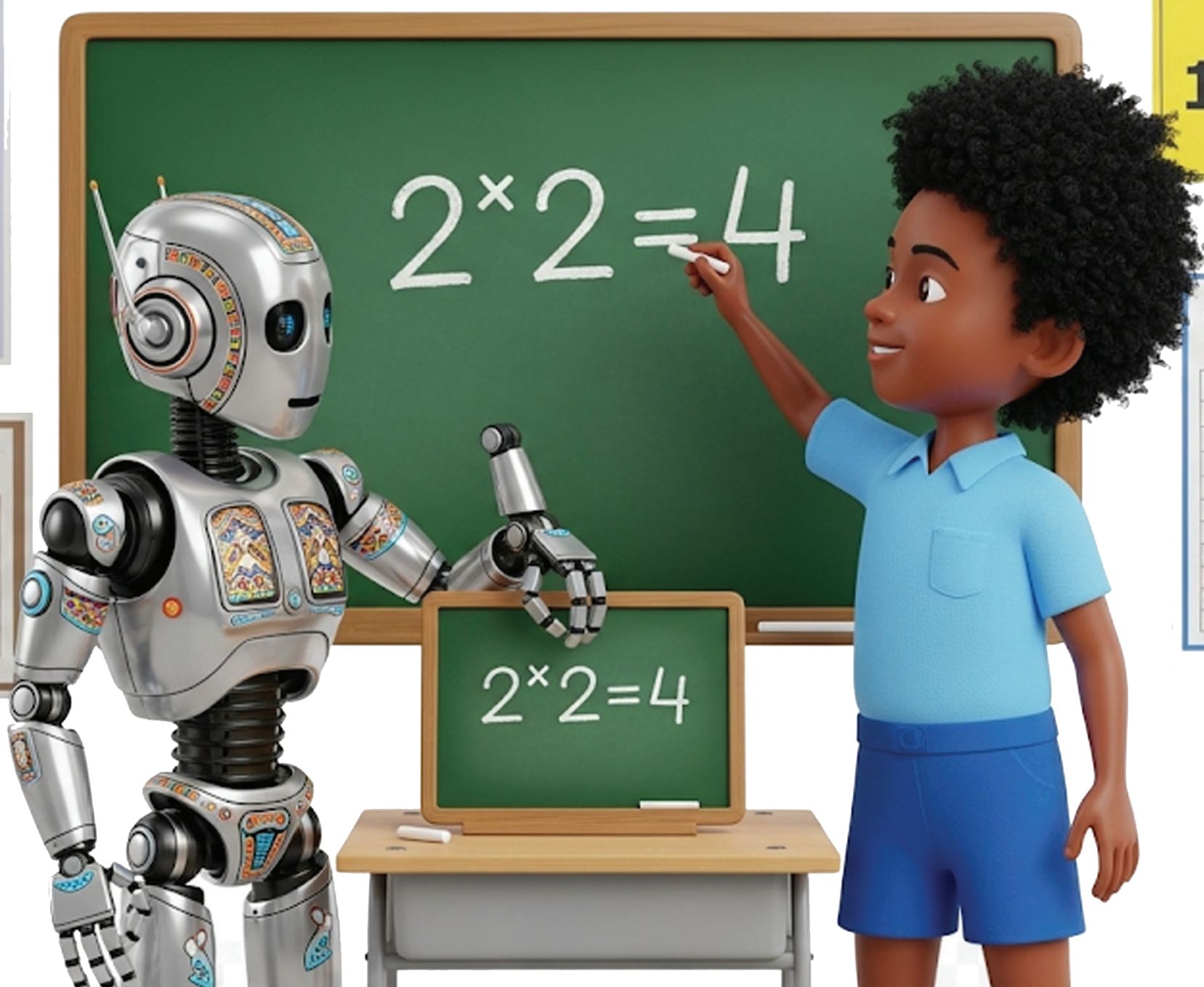
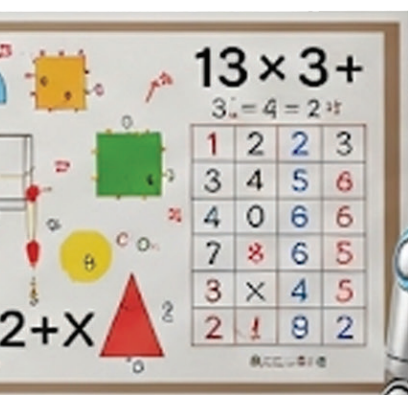




**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
FOUNDATION

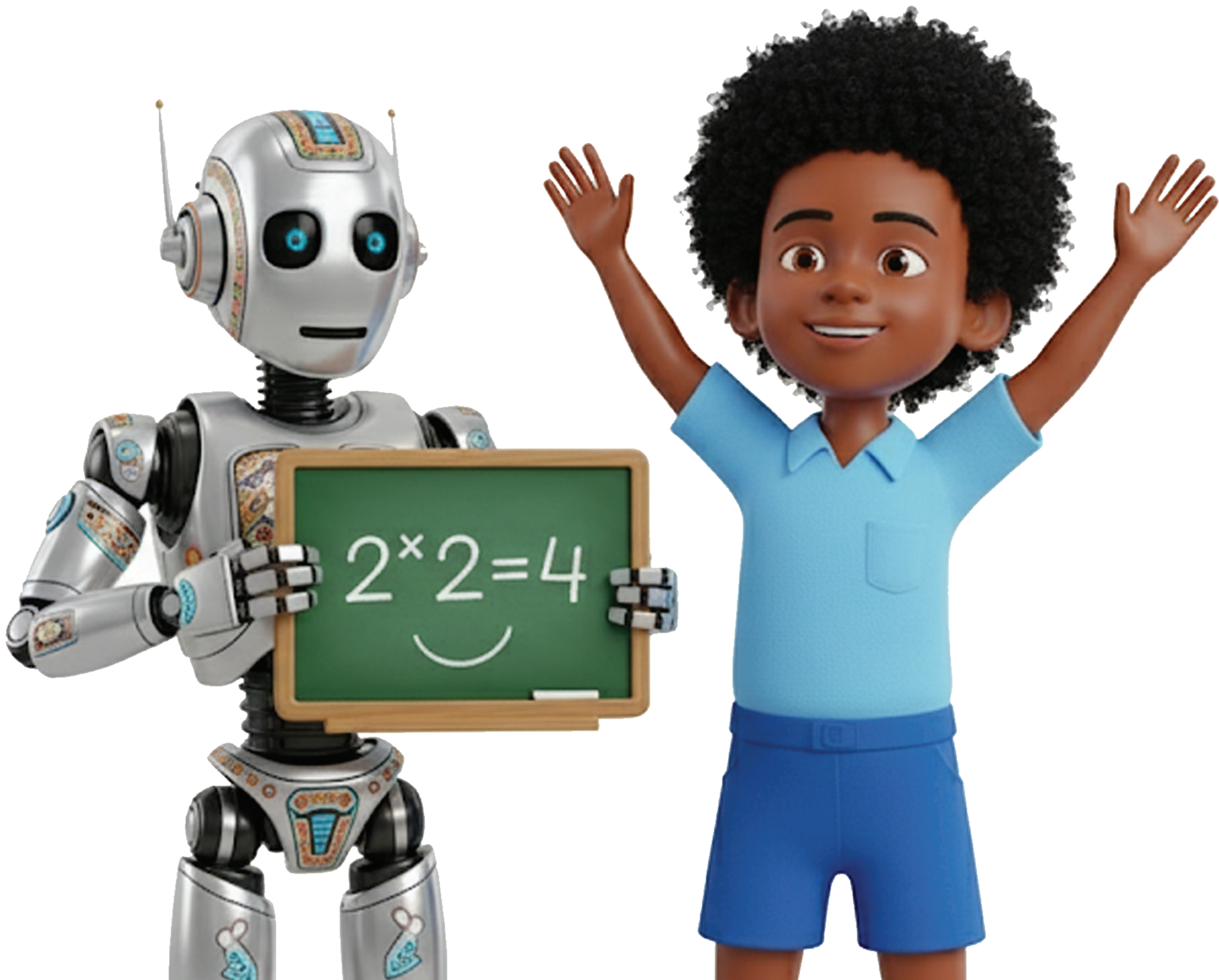


	1	2	3	4	5	6	7	8	9	10
1	1	2	3	4	5	6	7	8	9	10
2	2	4	6	8	10	12	14	16	18	20
3	3	6	9	12	15	18	21	24	27	30
4	4	8	12	16	20	24	28	32	36	40
5	5	10	15	20	25	30	35	40	45	50
6	6	12	18	24	30	36	42	48	54	60
7	7	14	21	28	35	42	49	56	63	70
8	8	16	24	32	40	48	56	64	72	80
9	9	18	27	36	45	54	63	72	81	90
10	10	20	30	40	50	60	70	80	90	100

# Machine Learning



**AI learns by practising, just  
like you with times tables.**

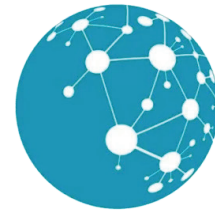


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
FOUNDATION



# Importance of Machine Learning





**The more AI practises,  
the smarter it becomes!**

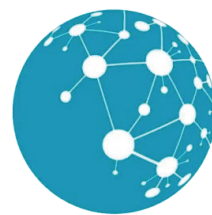


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE

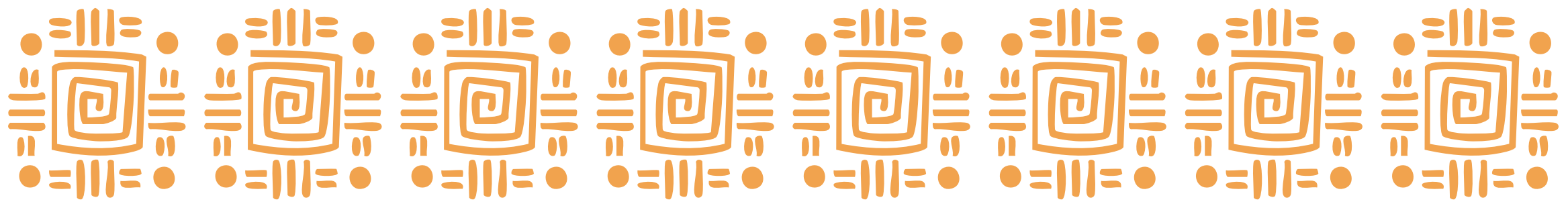


**Patrick J McGovern**  
FOUNDATION



# How Machine Learning works



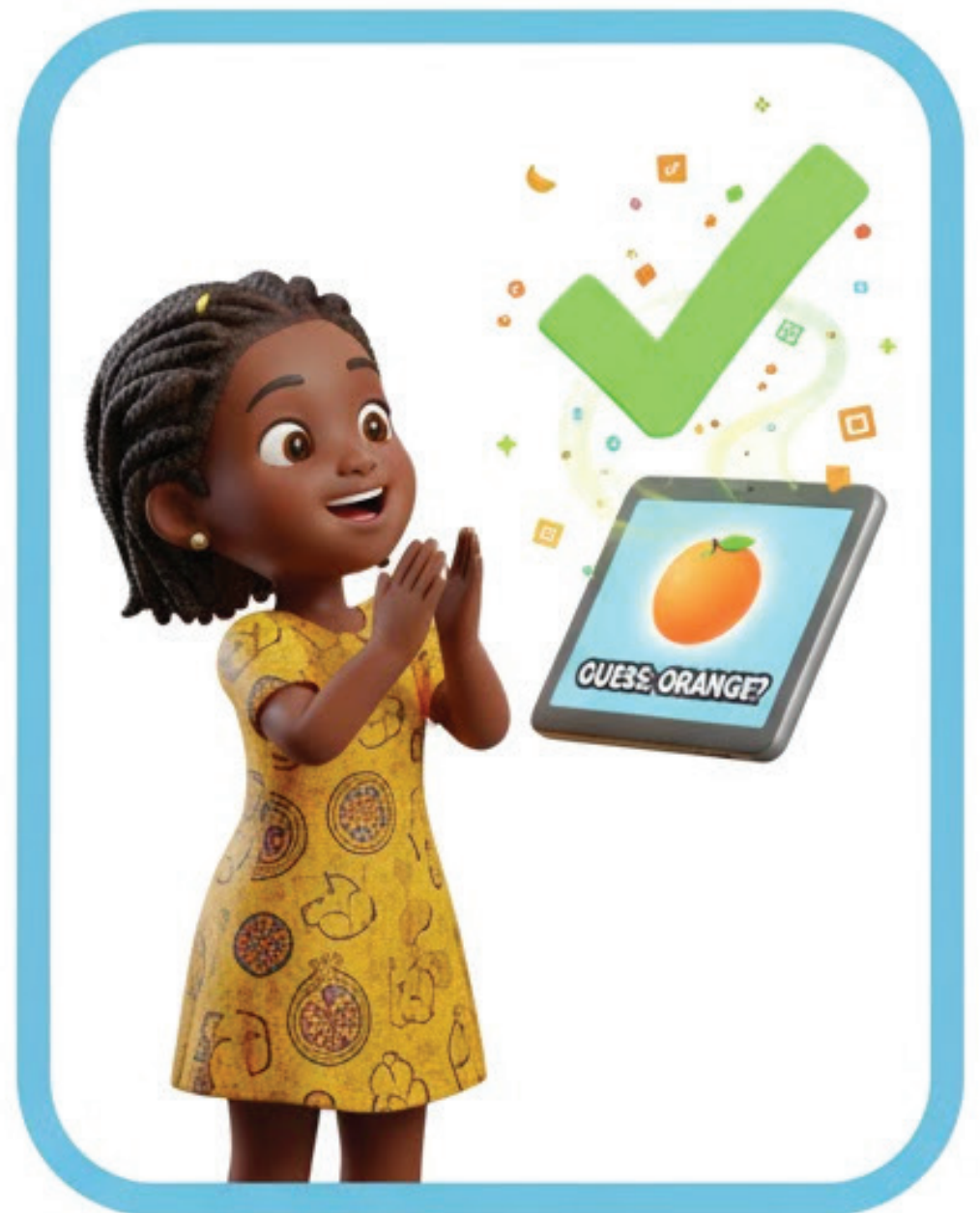


**Step 1: Train with examples.**  
**Step 2: Test what it learned.**

**Train**



**Test**

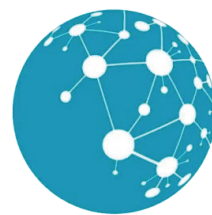


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
FOUNDATION



# Can AI think by itself?





**No! AI has no feelings. It  
only copies what it learned.**

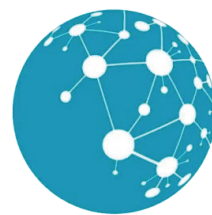


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE




**Patrick J McGovern**  
FOUNDATION



# Can AI do everything?





**AI is great at sorting,  
translating, and suggesting  
songs. But not everything.**

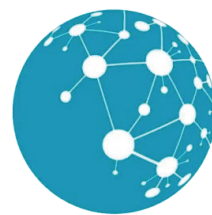


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
F O U N D A T I O N



# Can AI learn like humans?



**No. Humans learn from feelings and experience. AI only learns from examples.**

## Human Learning



## AI Learning

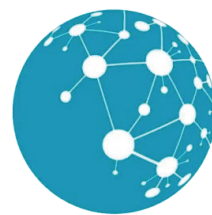


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE

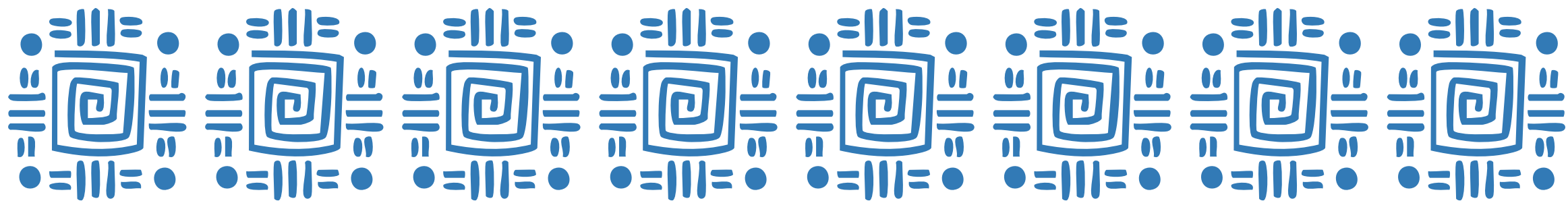


**Patrick J McGovern**  
FOUNDATION



# What good does AI do?





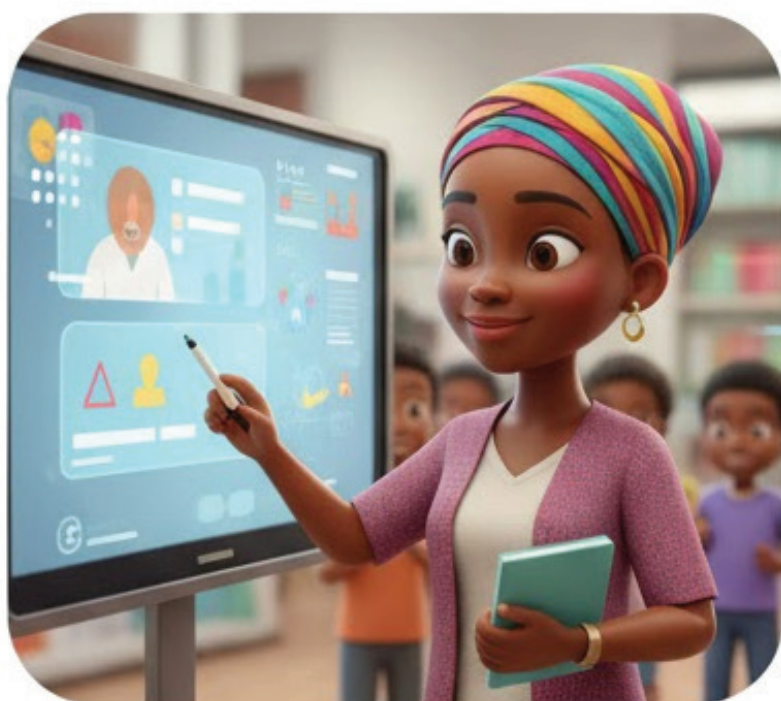
# AI helps doctors, farmers, teachers, and kids with homework.



AI DOCTOR



AI FARMER

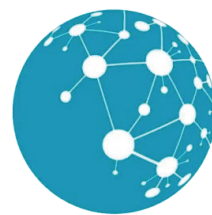


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE

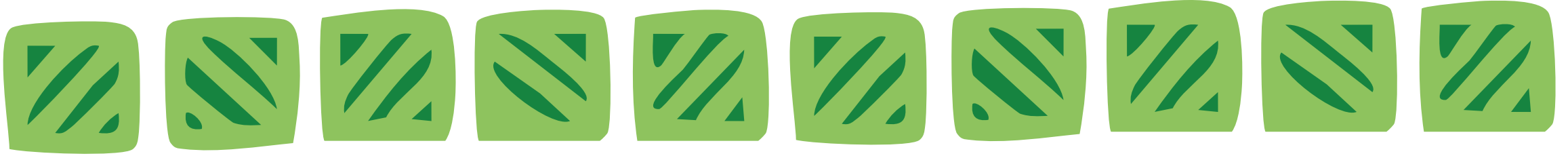


**Patrick J McGovern**  
FOUNDATION



**Can AI be wrong?**





**Yes! Always double-check  
with an adult.**

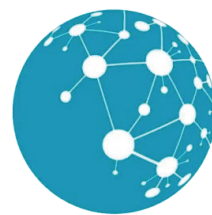


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
FOUNDATION



# Double-checking AI





**If AI says something silly,  
ask your teacher or parent.**

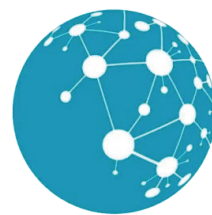


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE

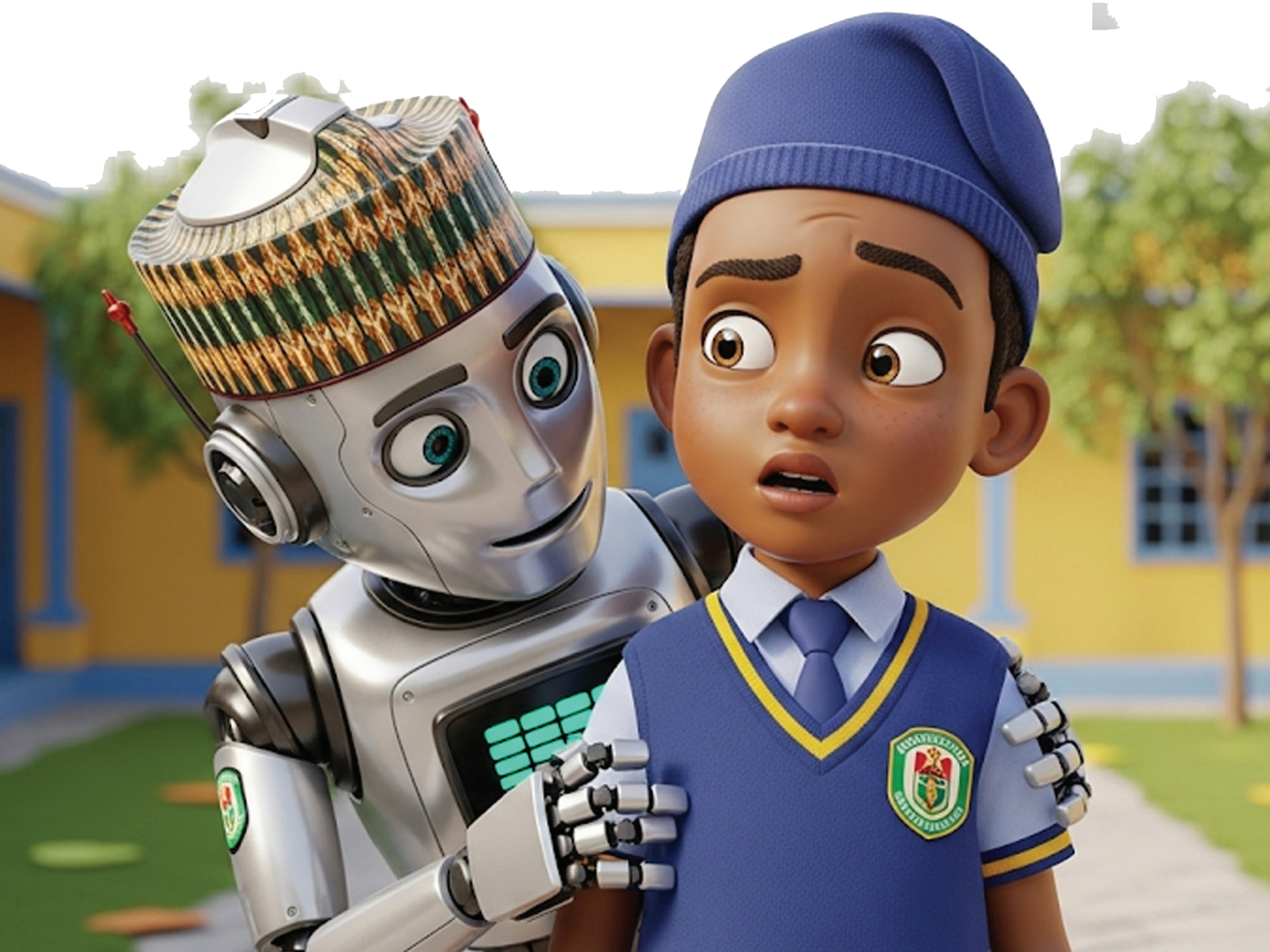




**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE




**Patrick J McGovern**  
F O U N D A T I O N



# Risks of AI





**Never share your full name,  
school, or home address online.**

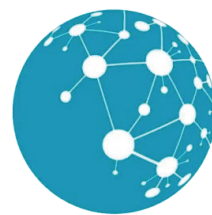


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE

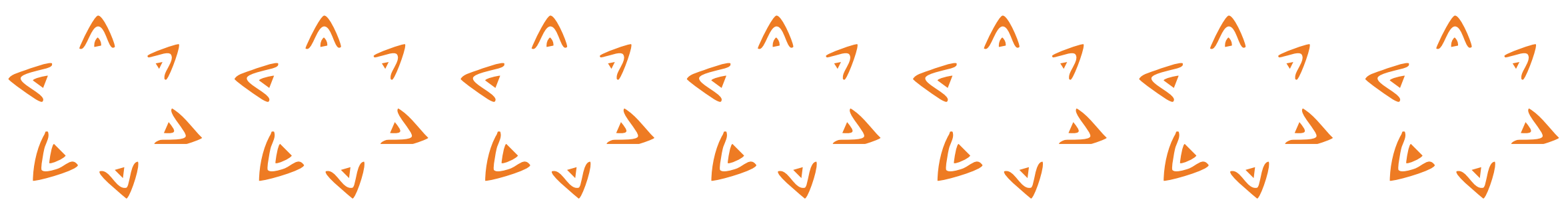


**Patrick J McGovern**  
FOUNDATION



# Safety First





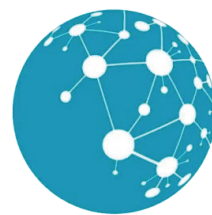
**Always use AI with your  
parents, guardians, or teachers.**







**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
F O U N D A T I O N



# Responsible Use of AI



**AI is like riding a bicycle: fun  
but needs rules.**

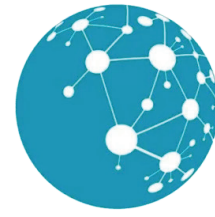


**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
F O U N D A T I O N



**Don't post Private Info**





**Ask an adult before sharing  
pictures or names.**



**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE





**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE



**Patrick J McGovern**  
FOUNDATION



# Remember!





**AI is smart, but YOU are smarter. Use it safely!**



**BRAIN BUILDERS**  
YOUTH DEVELOPMENT  
INITIATIVE