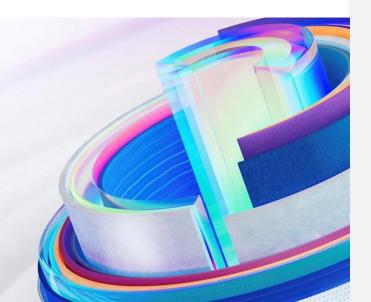


# **AI Teaching Assistant**

Leveraging Advanced Language Models to Solve Complex Business Challenges

# Winner

Microsoft Al Partner of the Year 2023













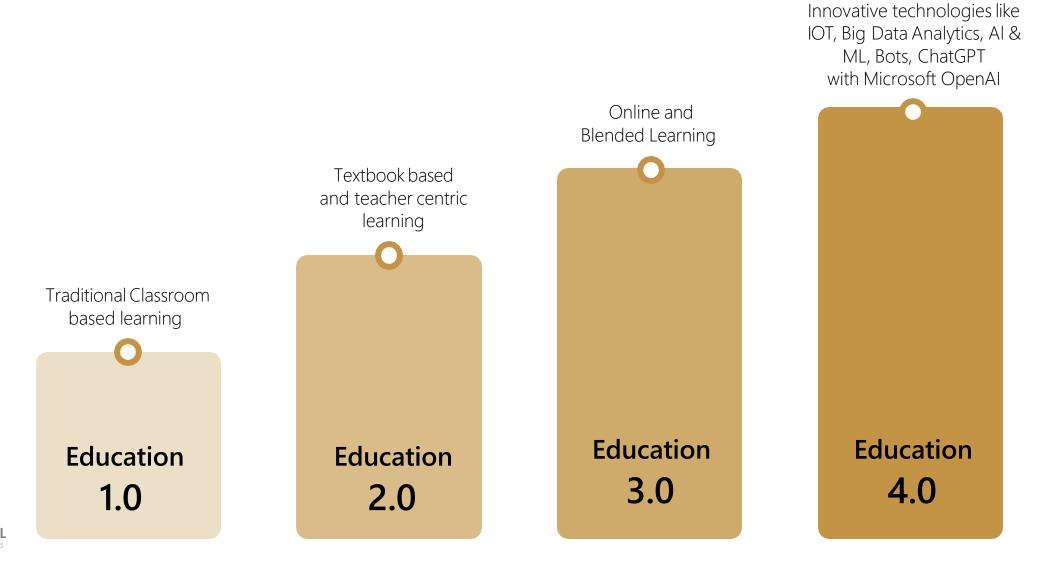
Vision

Speech

Language

Decision

# **Evolution of Education System**





# **Education 4.0**

# **Education 4.0**

A new era of education that leverages digital technologies, a data-driven approach, and a learner-centric focus driven by technological advancement and globalization









Digital literacy and skills



Lifelong learning



Globalization and connectivity



Data-driven decision making



Innovation and creativity



# **Artificial Intelligence Impact in Education**

Unleashing the Power of AI: Redefining Education for the Digital Age





## **AI Tutor**

Educational Co-Pilot that provides students with personalized support in their learning journey outside of the classroom

## Designed to:

- Improve students' understanding of subjects
- Offer instant feedback and guidance
- Make learning more engaging, fun, and interactive

## Capabilities

Personalization Gamification

Adaptability AI Tutor Performance

Multimodality Student outcomes

Customization Accessibility

Scalability Responsible AI

### **Our Solution Functionalities**



### Personalized Learning

An Al-powered tutor to enhance education with personalized learning, adaptive instruction, and real-time feedback for students, teachers, and parents.



# Assessment Creation

OpenAl generates high-quality assessment questions and question banks for teachers to use in creating exams, quizzes, and assignments.



# Assessment Grading

 Automate grading process for essays, short answer and multiple-choice questions, identifying strengths and weaknesses, and saving teacher's time.



### Intelligent Tutoring

 Al-powered tutoring systems for personalized guidance based on learning progress and interests, with analysis of student data to provide targeted instruction.



# Programming Assignments

 Generate programming assignments and provide feedback on student code and provide suggestions on how to improve performance and optimize code.



• Create analytics dashboards to monitor student performance and provide insights to parents.



### Gamification

 Use gamification techniques to motivate students and enhance learning by creating games that teach specific concepts and skills



# Recommendation Engines

 Provide personalized learning recommendations to students based on their learning progress, interests, and skills.

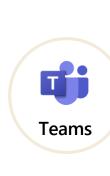


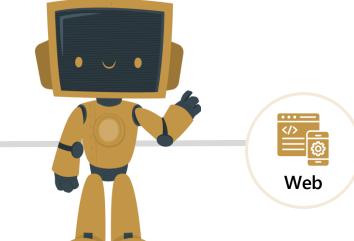
# Learn from anywhere on any device!



### **Increased Accessibility**

Easy access of learning materials without any constraint.







#### **Better Data Collection**

Collect data about learners' behaviors to improve their future learning experience.



### Flexibility

Learners choose the channel according to their preferences and learning styles.



### Scalability

Tutoring services can be easily expanded to meet growing demand while keeping the quality service.



### Consistency

Learners receive consistent guidance and support on both channels.



# **Future Roadmap**

# Added support for Visual content

- Intelligent video navigation markers based on text from Transcripts and OCR
- Custom Video Navigations & Heatmaps for Input Query



#### **Audio Podcasts**

- Support for podcast content
- Audio transcripts



#### **Multilingual Support**

• for additional languages for foreign students











# Tutor for Grading

• For automated grading of students



#### **Image Explanation**

 Solution will provide a mechanism to upload an image and get a textual explanation of the image



#### Summarization of content

• Textual, Video and Audio



#### **Futuristic Tech**

• HoloLens enabled learning





# **Student Persona**



# **Student Journey**

### Interaction

Student starts interacting with the tool to begin the journey

### **Problem Solving**

- Solve complex problems recommended by the tool.
- Participates in English writing, speaking skills and Assessments

### Review & Feedback

- Reviews the performance through the dashboard
- Shares the feedback to the Teacher



### **Concept Learning**

- Learn concepts in a playful and gamified way
- Student becomes a regular user

### **Exam Preparation**

- Takes part in the peer level competition
- Takes help in exam preparationStress Management

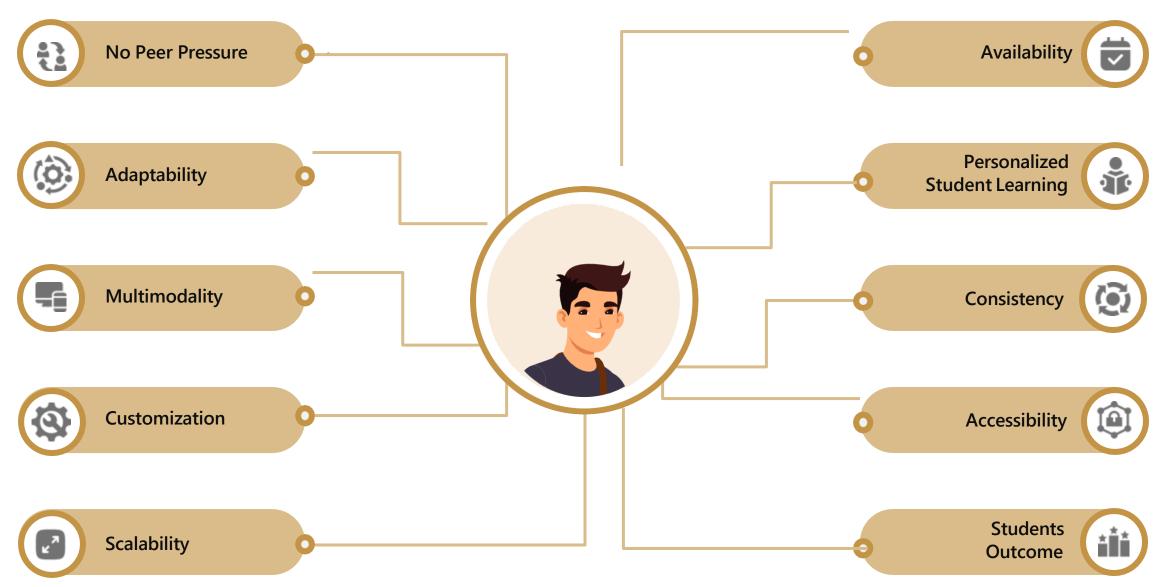
### **End Year**

- Student's current session ends
- He/She resumes using the tool once the new session will start





# **Value Proposition | Students**





## **Student Features**



#### Buddy Match

Assigns Social Service tasks to students, Smart Students will be buddies of fellow students, 20-30 hours of social service.



# Dialogue-based tutoring systems

Al and language processing simulate online spoken tutorials.



#### Al Driven Skill Passport

Al-enabled record of lifelong learning achievements.



#### **Learner Retention**

Suggest revision material to reinforce previous learning.



#### **Track Progress**

Track self-performance and receive instant feedback.



#### Continuous Improvement

Improve personalization by continuously collecting data.



#### Course access

Easy access to the courses for students to learn at their own pace and on their own schedule.



#### Discussion forums

Collaborate and engage in discussions with peers and instructors.



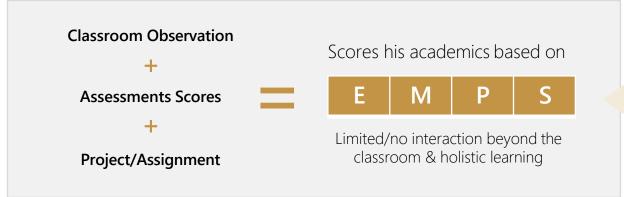
# **Teacher Persona**

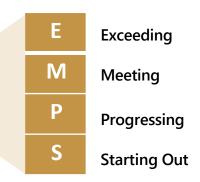


# **Value Propositions | Teachers**

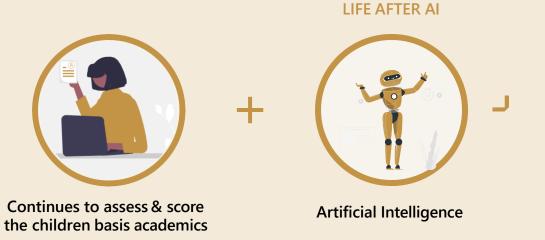
## **Current Approach**

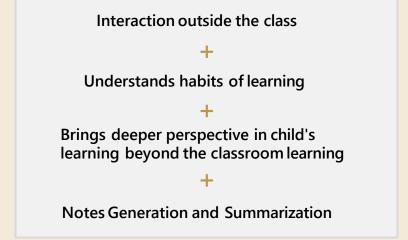


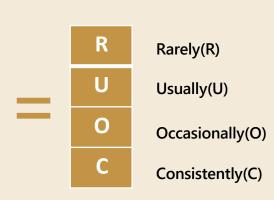




# **New Approach**









# **Teacher Journey**

### Interaction

Teacher gets the plan& subject for the upcoming session

1

#### Assessment

- Teacher will use the tool to generate assignment and exam papers
- and exam papersNumerical and theory based

3

### Review & Feedback

Student's performance review through the dashboard and understanding his strength and weaknesses

5







### Content

Teacher will use the tool to generate pause notes as per the subjects

2

### Scoring

Teacher will use the tool to share scores of the students and grading them.

4

### **End Year**

Teacher will wait for the next session to start

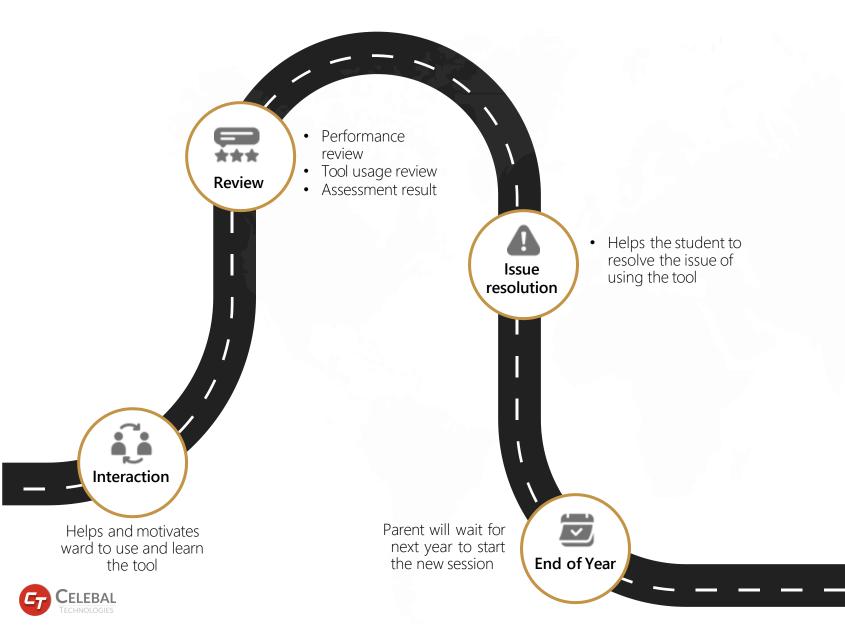
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# **Parent Persona**



# **Parent Journey**





# **Value Proposition**

Student Habits Observation Levels	Habits of Learning	Student Academics Segment
Rarely(R)	Curiosity	
	Engagement	Starting Out
Occasionally(O)	Critical Thinking	
	Active learning	Progressing
Usually(U)	Problem Solving	ney
	Persistence	Meeting
	Collaboration	
Consistently(C)	Communication	Exceeding

