# Configurable Framework for Smart Serious Gaming Analytics

## **Technology Overview**

The smart serious gaming analytics engine is utilised to understand and enhance learner's skills and performance. It captures the in-game actions and decisions made during the game play to analyse learner's behaviour. It leverages on artificial intelligence/machine learning (Al/ML) technologies to identify learning patterns, and provides a personalised learning strategy [e.g. recommend topic(s) for the learner to focus on]. This innovative engine can be extended easily to other subjects/modules without changing any codes.

### Features & Specifications

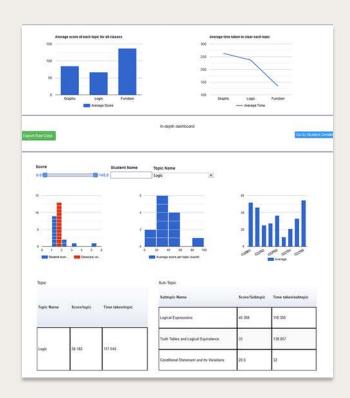
The unique features of this technology are that it is:

- Configurable can be used for different subjects without modification.
- Scalable can be used for more than one subject concurrently without changing any codes.
- Informative can provide important learning insights about learners.

The technology has four key components:

- Data collection engine
- Learning analytics engine
- Learning analytics and visualisation
- Personalised learning strategy recommendation engine





#### **Customer Benefits**

- Learners benefit from personalised, interactive learning with self-assessment.
- Instructors benefit from visual insight of learner learning patterns and experience to help learners understand better.
- Management obtains indicators of learner's learning journey to help policy and decision-making.

# **Potential Applications**

This technology can be applied in:

- Serious game companies
- Learning institutions



Research & Technology Development rtd@tp.edu.sg +65 6780 5595