SOLO taxonomy: Creating a digital game (5-6)

We are creating an online game				
SOLO LEVEL	**One**	**Many**	**Relate**	**Extend**
SOLO VERB	***Identify isolated skills***	***Describe and combine serial skills***	***Integrate skills***	***Evaluate skills***
DECLARATIVE KNOWLEDGE Knowing about (talking or writing about) the programming code Creating a game requiring user input using visual programming language Success criteria	I can **DEFINE** a problem identifying functional and data requirements I can **IDENTIFY** **…** the use of isolated visual programming skills in my digital game For example, the use of: ☐ an if/then statement ☐ loops or repetition ☐ user input	I can **DESCRIBE** the programming sequence using the storyboard or flow chart; for example, the use of loops when: ☐ incorporating repeat instructions ☐ allowing for varied user input ☐ selecting options	… AND I can **EXPLAIN** HOW and WHY my programming choices, when integrating the different visual processing skills, meet the user input purpose of my digital game. For example, explain how a logical sequence of visual programming skills codes for user input	AND I can **EVALUATE** the effectiveness of my game in meeting its functional requirements for: ☐ user input ☐ game play
FUNCTIONING KNOWLEDGE Knowing how to Designing a game requires user input using visual programming language Success criteria	I can use a storyboard to design a game and identify its functional and data requirements I can create a digital game using a visual programming language **IF** I copy game programming examples created by someone else	I can independently create a digital game using a visual programming language BUT I am not sure about my programming and I struggle to debug any errors that occur	I can independently and confidently create a digital game using a visual programming language AND I can debug as I build (correct my own code)	AND I can seek and act on feedback to improve the effectiveness of my programming choices as I go, or perhaps when building a game that incorporates user input

SOLO taxonomy: Creating a digital game (5-6)

DECLARATIVE KNOWLEDGE Knowing about Designing a game requiring user input using visual programming language Success criteria	I can **IDENTIFY** the needs of a user eg a digital design solution – a user input interface ☐ empathise ☐ define	I can **ELABORATE** on these needs by sketching out different options for the user input interface I **ANNOTATE** each design to clarify the different options for the user input interface ☐ ideate	I can **BUILD** models or representations (prototypes) of the user input interface to learn more about the digital design solution ☐ prototype For example, I can **SEQUENCE** (storyboard) the development of the user input interface I can annotate the sequence to **EXPLAIN** how the prototype development ensures the user input interface better meets user needs	I can **TEST** the prototypes to make sure the solution will work as intended I can **CREATE** an online game that incorporates the user input interface ☐ test I can **EVALUATE** the effectiveness of the user input interface against clearly established criteria for the user's needs
Digital technologies **Way of thinking**	**Design thinking**	**Design thinking** **Computational thinking**	**Design thinking** **Computational thinking**	**Systems thinking**

As learning progresses, it becomes more complex. SOLO stands for the Structure of the Observed Learning Outcome. It is a means of classifying learning outcomes in terms of their complexity. It can help differentiate a task to enable students to operate at their level and provide learning tasks that are progressively more challenging.

For more about SOLO Taxonomy refer to these websites

John Biggs Solo Taxonomy

HookED: Solo Taxonomy