**Test cases**

Consider the sprint task #31 – Develop DB access code for retrieving the old runs which can search an old run based on one or more of the following information: date, time, size of the environment, number of regions, and number of steps for completion

Some of the test cases for this task are as follows:

|  |  |  |  |
| --- | --- | --- | --- |
| Test case #sprint 5 | Scenario | Input(s) | Expected output |
| 1 | User select date as the search condition | Start date and end date with start date is the time before the end date | Shows a list of history runs that meet the restriction |
| 2 | User select date as the search condition | Start date and end date with start date after the end date | Prompt the start date should before the end date |
| 3 | User select time as the search condition | Start time and end time with start time before the end time | Shows a list of history runs that meet the restriction |
| 4 | User select time as the search condition | Start time and end time with start time after the end time | Prompt the start time should be before the end time |
| 5 | User select the size of environment as the search condition | The width and length of the environment | Shows a list of history runs that meet the restriction |
| 6 | User select the number of regions as the search condition | The number of regions | Shows a list of history runs that meet the restriction |
| 7 | User select the number of steps for completion as the search condition | The number of steps for completion | Shows a list of history runs that meet the restriction |
| 8 | User select multiple options as the search condition | Multiple corresponding parameters | Shows a list of history runs that meet all the restrictions |

Consider the sprint task #32 – Develop GUI to support selecting the parameters like date, time, size of the environment, number of regions, and number of steps for completion

Some of the test cases for this task are as follows:

|  |  |  |  |
| --- | --- | --- | --- |
| Test case #sprint 5 | Scenario | Input(s) | Expected output |
| 1 | User select the date | User choose the date option from the parameter option list | The GUI display the date input part |
| 2 | User select the time | User choose the time option from the parameter option list | The GUI display the time input part |
| 3 | User select the size of environment | User choose the size of environment option from the parameter option list | The GUI display the size input part |
| 4 | User select the number of regions | User choose the number of regions option from the parameter option list | The GUI display the number of regions input part |
| 5 | User select the number of steps for completion | User choose the number of steps for completion option from the parameter option list | The GUI display the number of steps for completion input part |
| 6 | User select more than one option | User choose more than one option from the parameter option list | The GUI display multiple corresponding input part |

Consider the sprint task #34 – Validating the format and legitimacy of inputting file

Some of the test cases for this task are as follows:

|  |  |  |  |
| --- | --- | --- | --- |
| Test case #sprint 5 | Scenario | Input(s) | Expected output |
| 1 | User upload the configuration file | Configuration file with correct format | Execute correctly |
| 2 | User upload the configuration file | Configuration file with incorrect format | Prompt file format error |
| 3 | User upload the configuration file that contains an agent which is out of the region | Configuration file that contains an agent which is out of the region | Prompt that an agent is out of the region |
| 4 | User upload the configuration file that contains a region which is out of the environment | Configuration file that contains a region which is out of the environment | Prompt that a region is out of the environment |
| 5 | User upload the configuration file that contains two joint regions | Configuration file that contains two joint regions | Prompt that there are two joint regions |
| 6 | User upload the configuration file that contains an isolate open space | Configuration file that contains an isolate open space | Prompt that there is an isolate open space |
| 7 | User upload the configuration file that contains a region with no agent | Configuration file that contains a region with no agent | Prompt that there is a region with no agent |