

Claims

1. A method for generating a test case for a transformation module of a data-integration workflow, the method comprising:

- receiving a request to create the test case for the transformation module of the data-integration workflow that is compatible with a software framework;

- identifying a first network path from an input data source to the transformation module in the data-integration workflow;

- identifying a second network path from the transformation module to an output data source in the data-integration workflow;

- generating code that defines the test case for the transformation module; and

- executing the test case in the software framework by:

 - sending input data from a simulated input data source of the test case

 - to the transformation module without accessing the input data source; and

 - receiving output data at a simulated output data source of the test case from the transformation module without accessing the output data source.

2. The method of claim 1, further comprising:

- displaying a graphical model of the data-integration workflow in a graphical user interface (GUI), wherein at least one icon of the graphical model represents the transformation module; and

- receiving the request via the graphical user interface, wherein selection of the at least one icon identifies the transformation module.

3. The method of claim 1, further comprising:

- receiving test input data for the test case; and

- receiving target output data for the test case, wherein executing the test case comprises:

 - executing the transformation module using the test input data,

 - receiving the actual output data from the transformation module, and

 - comparing the actual output data to the target output data.

4. The method of claim 3, further comprising:
 - determining, based on the comparison of the actual output data to the target output data, whether the transformation module passed or failed a test defined by the test case, the test input data, and the target output data; and
 - storing an indication of the determination.
5. The method of claim 3, further comprising:
 - determining that the transformation module has been changed, wherein the test case is executed in response to the determination.
6. The method of claim 3, wherein executing the test case includes simulating the input data source to provide the test input data to the transformation module.
7. The method of claim 1, wherein the test case is associated with a version of the data-integration workflow.
8. A non-transitory computer-readable storage medium containing instructions that, when executed by one or more processors, perform an operation for generating a test case for a transformation module of a data-integration workflow, the operation comprising:
 - receiving a request to create the test case for the transformation module of the data-integration workflow that is compatible with a software framework;
 - identifying a first network path from an input data source to the transformation module in the data-integration workflow;
 - identifying a second network path from the transformation module to an output data source in the data-integration workflow;
 - generating code that defines the test case for the transformation module; and
 - executing the test case in the software framework by:

sending input data from a simulated input data source of the test case to the transformation module without accessing the input data source; and receiving output data at a simulated output data source of the test case from the transformation module without accessing the output data source.

9. The non-transitory computer-readable storage medium of claim 8, wherein the operation further comprises:

displaying a graphical model of the data-integration workflow in a graphical user interface (GUI), wherein at least one icon of the graphical model represents the transformation module; and

receiving the request via the graphical user interface, wherein selection of the at least one icon identifies the transformation module.

10. The non-transitory computer-readable storage medium of claim 8, wherein the operation further comprises:

receiving test input data for the test case; and

receiving target output data for the test case, wherein executing the test case comprises:

executing the transformation module using the test input data,

receiving the actual output data from the transformation module, and

comparing the actual output data to the target output data.

11. The non-transitory computer-readable storage medium of claim 10, wherein the operation further comprises:

determining, based on the comparison of the actual output data to the target output data, whether the transformation module passed or failed a test defined by the test case, the test input data, and the target output data; and

storing an indication of the determination.

12. The non-transitory computer-readable storage medium of claim 10, wherein the operation further comprises:

determining that the transformation module has been changed, wherein the test case is executed in response to the determination.

13. The non-transitory computer-readable storage medium of claim 10, wherein executing the test case includes simulating the input data source to provide the test input data to the transformation module.

14. The non-transitory computer-readable storage medium of claim 8, wherein the test case is associated with a version of the data-integration workflow.

15. A system for generating a test case for a transformation module of a data-integration workflow, comprising:

- one or more processors; and

- a memory storing one or more applications that, when executed on the one or more processors, perform an operation, the operation comprising:

 - receiving a request to create the test case for the transformation module of the data-integration workflow that is compatible with a software framework;

 - identifying a first network path from an input data source to the transformation module in the data-integration workflow;

 - identifying a second network path from the transformation module to an output data source in the data-integration workflow;

 - generating code that defines the test case for the transformation module; and

 - executing the test case in the software framework by:

 - sending input data from a simulated input data source of the test case to the transformation module without accessing the input data source; and

 - receiving output data at a simulated output data source of the test case from the transformation module without accessing the output data source.

16. The system of claim 15, wherein the operation further comprises:
displaying a graphical model of the data-integration workflow in a graphical user interface (GUI), wherein at least one icon of the graphical model represents the transformation module; and
receiving the request via the graphical user interface, wherein selection of the at least one icon identifies the transformation module.
17. The system of claim 15, wherein the operation further comprises:
receiving test input data for the test case; and
receiving target output data for the test case, wherein executing the test case comprises:
executing the transformation module using the test input data,
receiving the actual output data from the transformation module, and
comparing the actual output data to the target output data.
18. The system of claim 17, wherein the operation further comprises:
determining, based on the comparison of the actual output data to the target output data, whether the transformation module passed or failed a test defined by the test case, the test input data, and the target output data; and
storing an indication of the determination.
19. The system of claim 17, wherein the operation further comprises:
determining that the transformation module has been changed,
wherein the test case is executed in response to the determination.
20. The system of claim 17, wherein executing the test case includes simulating the input data source to provide the test input data to the transformation module.