If you are getting the error NameError: name 'execute' is not defined

Change the lines :

```
#execute the circuit using the backend
out = execute(qc,backend).result().get_statevector()
```

To these:

```
#execute the circuit using the backend
compiled_circuit = transpile(qc,backend)
out = backend.run(compiled_circuit).result().get_statevector()
```