Test Driven Development

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Topics

- What is Test Driven Development (TDD)
- TDD Cycle
What is Test Driven Development (TDD)

- Software development process
- Get something working now and improve it later
- Think about how to test, before implementing your application
- *is a programming technique that requires you to write actual code and automated test code simultaneously. This ensures that you test your code—and enables you to retest your code quickly and easily, since it’s automated.*
TDD Steps

1. Add a test
2. Run the tests
   - [Pass]
   - [Fail]
3. Make a little change
   - [Fail]
4. Run the tests
   - [Pass, Development continues]
   - [Pass, Development stops]
Test States

Refactor code
[Tests unbroken]

Green
[All tests pass]

Can't think of any more tests

Refactor code
[Test(s) broken]

Fix functional code

Red
[One or more tests fail]

write failed test

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