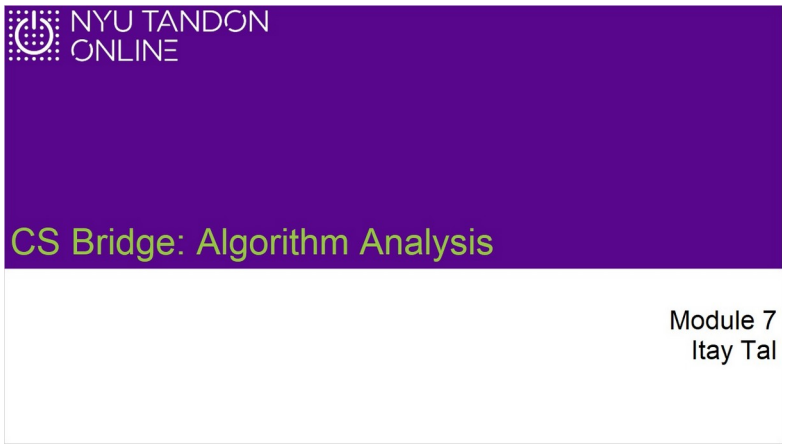
CS Bridge Module 7 Algorithm Analysis

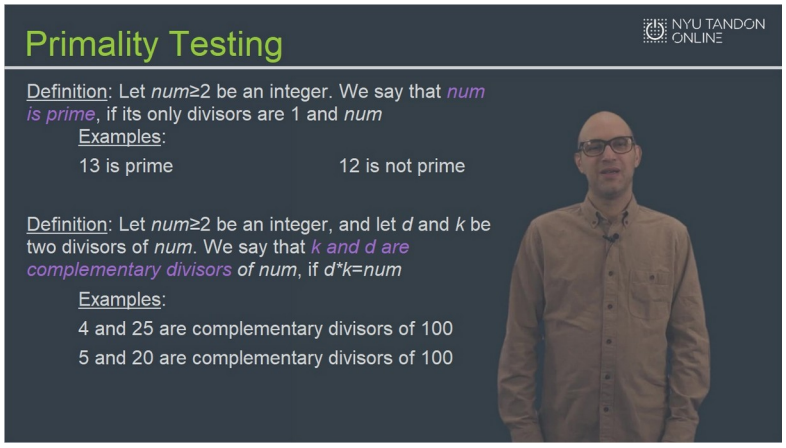
1. Module 7 Algorithm Analysis

1.1 Title Slide

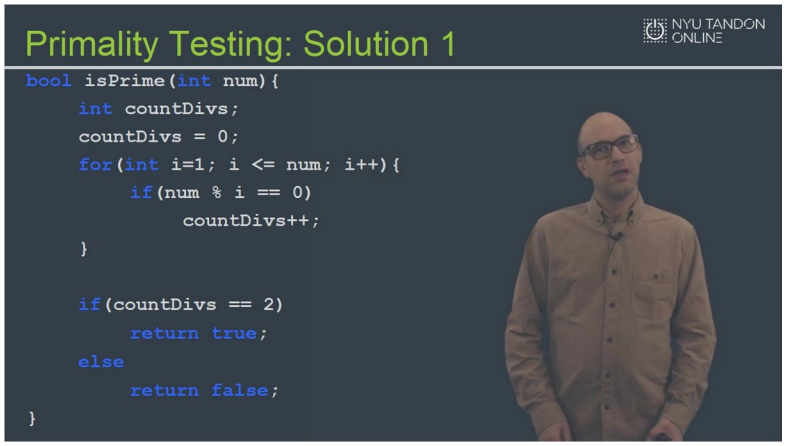


2. The Primality Testing Problem

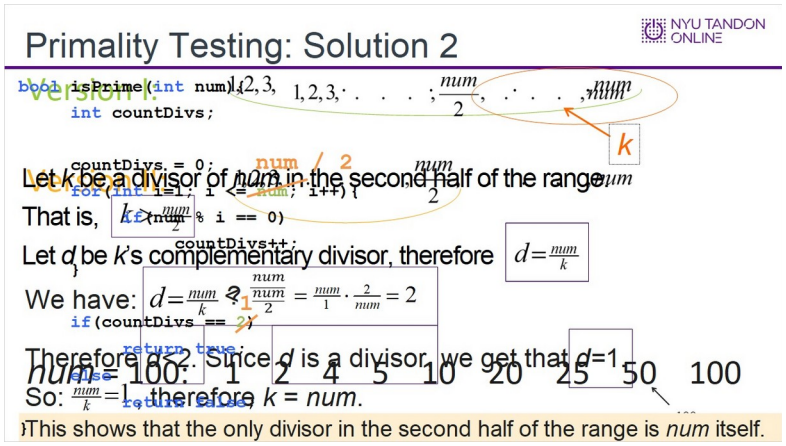
2.1 Primality Testing



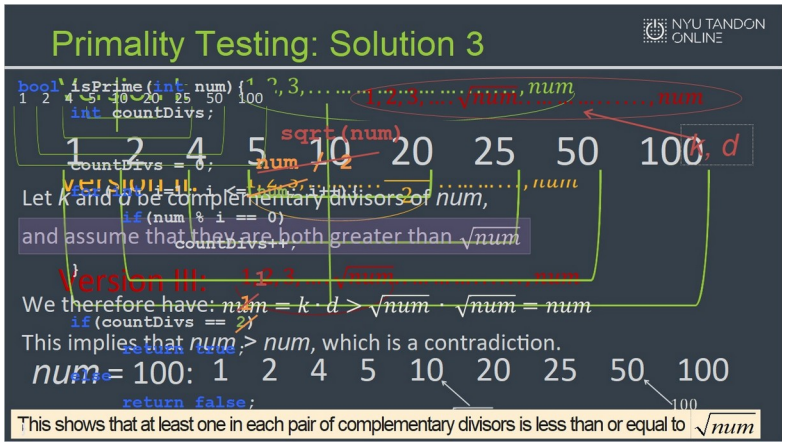
2.2 Primality Testing: Solution 1



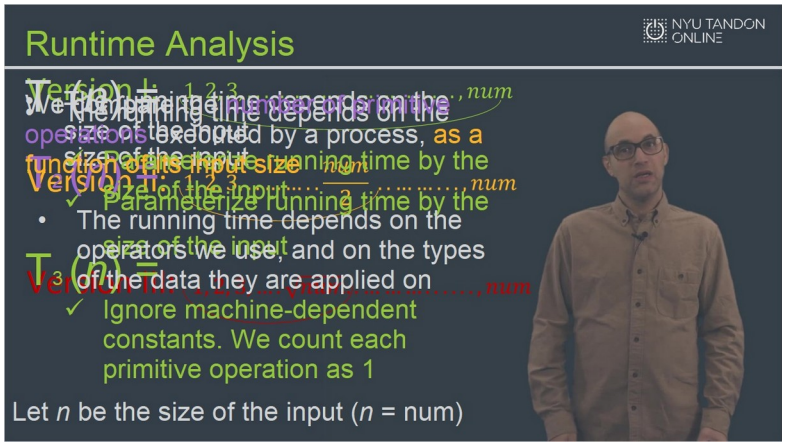
2.3 Primality Testing: Solution 2



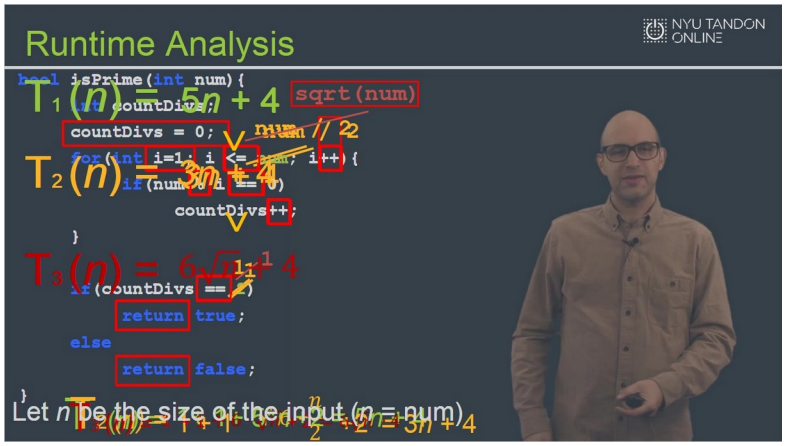
2.4 Primality Testing: Solution 3



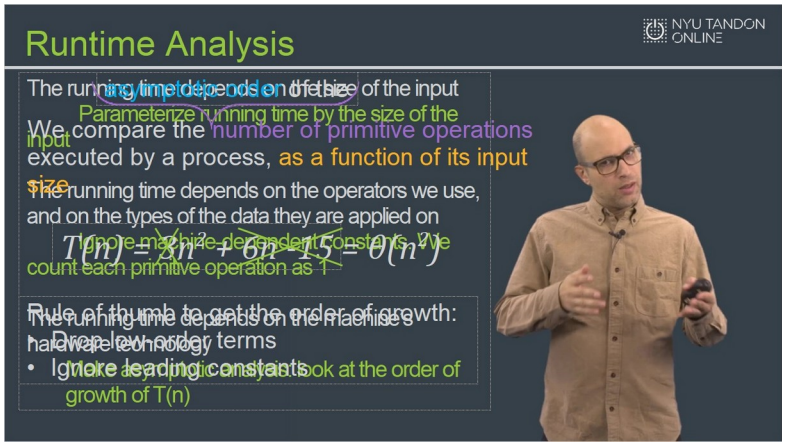
2.5 Runtime Analysis Part 1



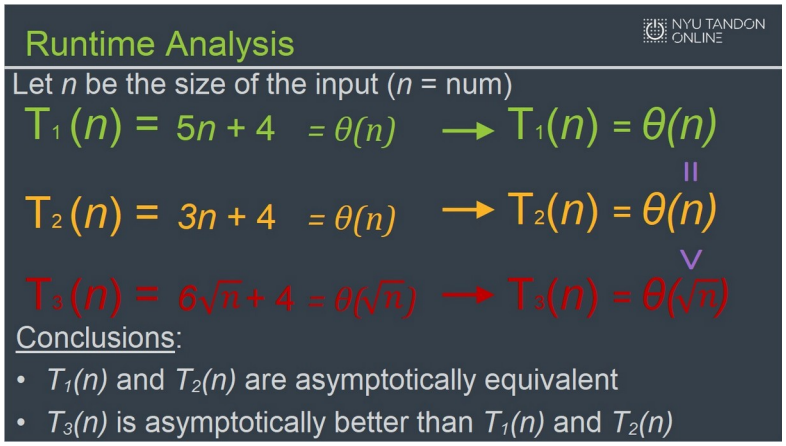
2.6 Runtime Analysis Part 2



2.7 Runtime Analysis Part 3

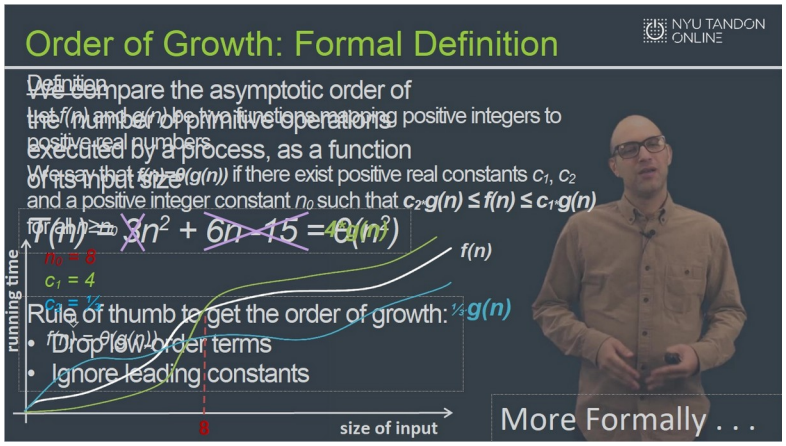


2.8 Runtime Analysis Part 4

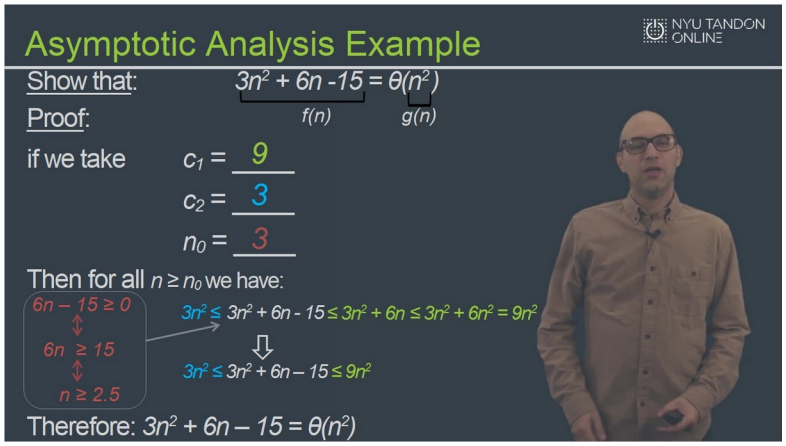


3. Asymptotic Analysis

3.1 Order of Growth: Formal Definition



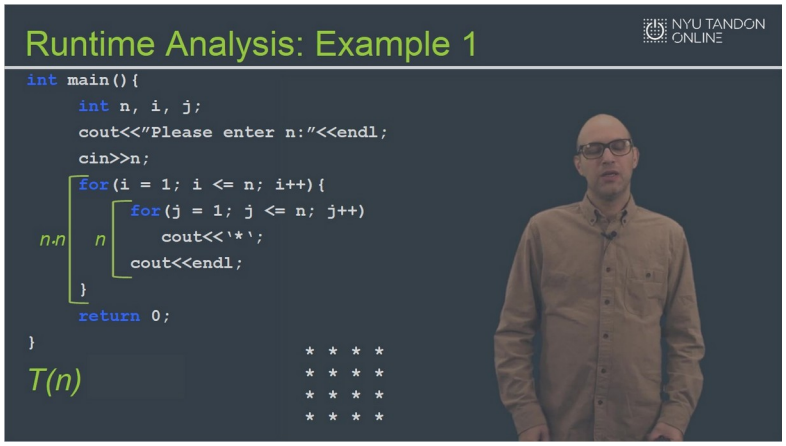
3.2 Asymptotic Analysis Example



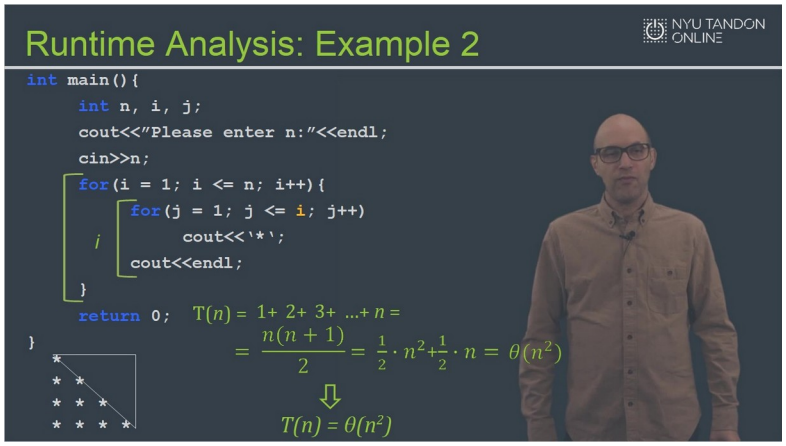
Notes:

4. Runtime Analysis

4.1 Runtime Analysis: Example 1

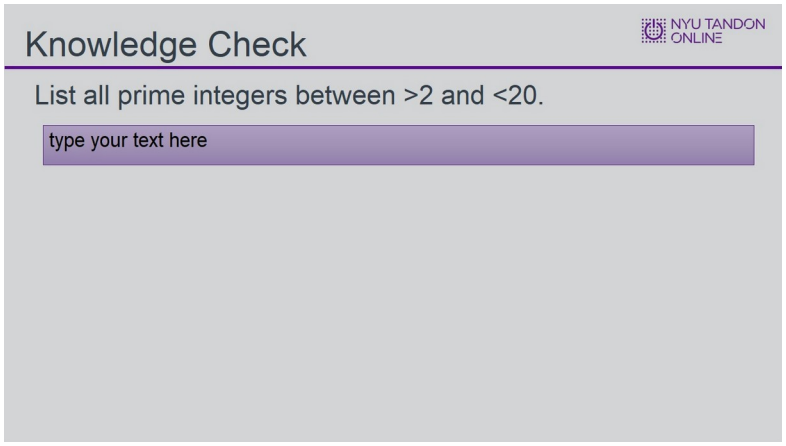


4.2 Runtime Analysis: Example 2



4.3 Knowledge Check

(Fill-in-the-Blank, 10 points, unlimited attempts permitted)

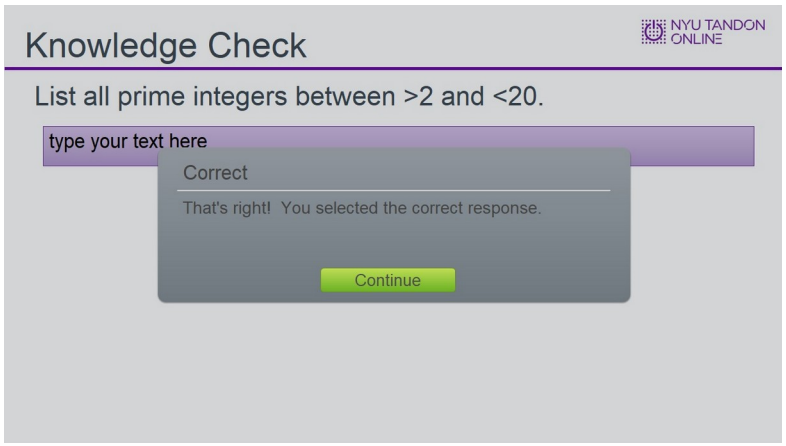


Choice
3, 5, 7, 11, 13, 17, 19
3,5,7,11,13,17,19
3 5 7 9 11 13 17 19

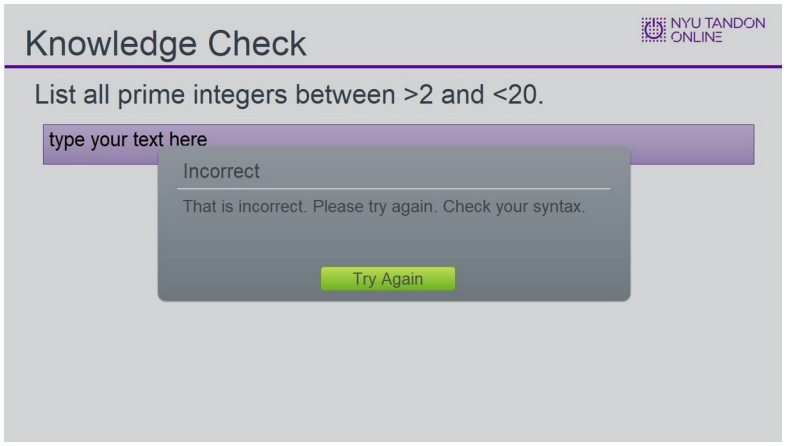
Feedback when correct:

That's right! You selected the correct response.

Correct (Slide Layer)

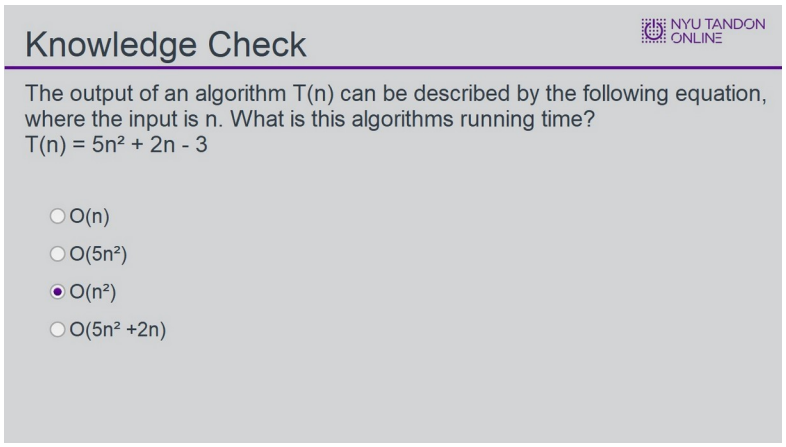


Try Again (Slide Layer)



4.4 Knowledge Check

(Multiple Choice, 10 points, 4 attempts permitted)

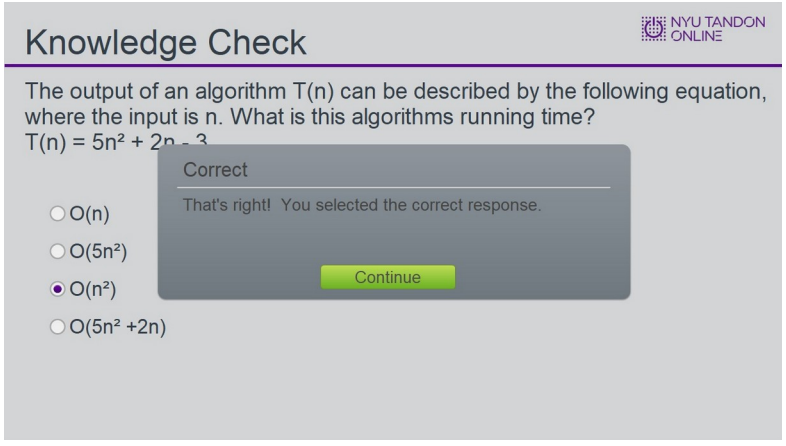


Correct	Choice
	O(n)
	O(5n²)
X	O(n²)
	O(5n² +2n)

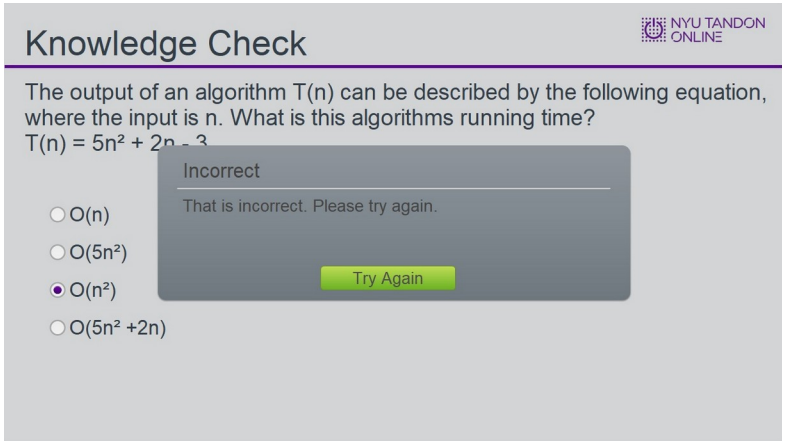
Feedback when correct:

That's right! You selected the correct response.

Correct (Slide Layer)

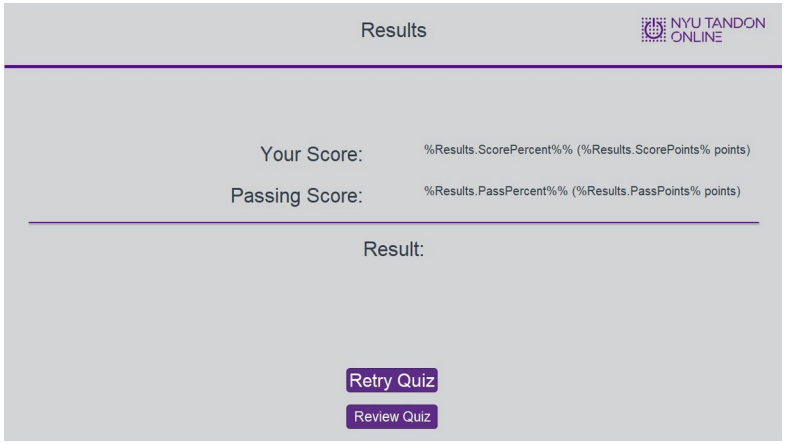


Try Again (Slide Layer)



4.5 Results Slide

(Results Slide, 0 points, 1 attempt permitted)



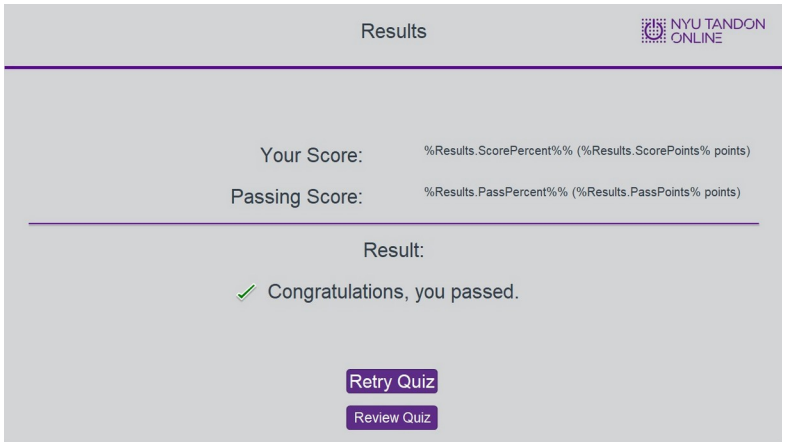
Results for
4.3 Knowledge Check
4.4 Knowledge Check

Result slide properties

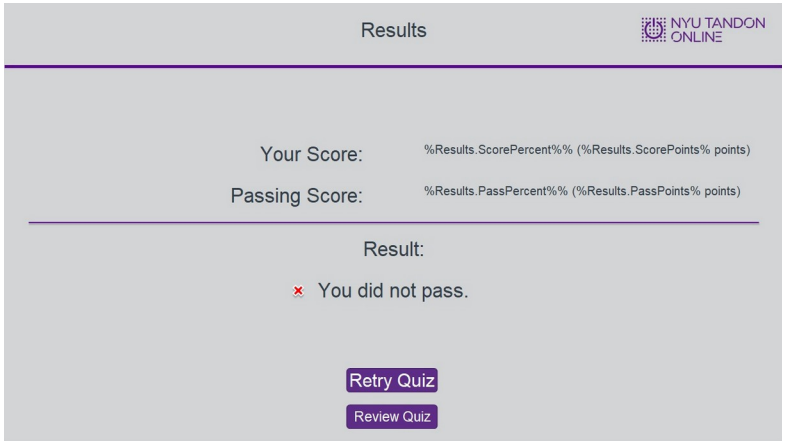
Passing Score	80%

Notes:

Success (Slide Layer)



Failure (Slide Layer)



4.6 End of Module